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Ontario

# Air Quality in Ontario

**APPENDIX  
1997**





# Air Quality in Ontario 1997

## Appendix

November 1999

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# TABLE OF CONTENTS

## PAGE NO.

INTRODUCTION .....	i
APPENDIX A .....	i
APPENDIX B .....	iii
TABLE 1 .....	1
TABLE 2 .....	3
TABLE 3 .....	5
TABLE 4 .....	6
TABLE 5 .....	7
TABLE 6 .....	9
TABLE 7 .....	10
TABLE 8 .....	11
TABLE 9 .....	12
TABLE 10 .....	13
TABLE 11 .....	14
TABLE 12 .....	15
TABLE 13 .....	17
TABLE 14 .....	17
TABLE 15 .....	18
TABLE 16 .....	20
TABLE 17 .....	21
TABLE 18 .....	22
TABLE 19 .....	23
TABLE 20 .....	24
TABLE 21 .....	25
TABLE 22 .....	26
TABLE 23 .....	27
TABLE 24 .....	27
TABLE 25 .....	28
TABLE 26 .....	29
TABLE 27 .....	30
TABLE 28 .....	31
TABLE 29 .....	32
TABLE 30 .....	33
TABLE 31 .....	34
TABLE 32 .....	34
TABLE 33 .....	35
TABLE 34 .....	36

**TABLE OF CONTENTS (Con'd)****PAGE NO.**

TABLE 35	10-Year Trend for NO <sub>x</sub> .....	37
TABLE 36	10-Year Trend for NO <sub>x</sub> .....	38
TABLE 37	10-Year Trend for O <sub>3</sub> .....	39
TABLE 38	Stations Used in Gaseous Trends .....	40
TABLE 39	VOC Annual Statistics at Egbert (1997) .....	41
TABLE 40	VOC Annual Statistics at Etobicoke South (1997) .....	43
TABLE 41	VOC Annual Statistics at Hamilton Downtown (1997) .....	47
TABLE 42	VOC Annual Statistics at Ottawa (1997) .....	51
TABLE 43	VOC Annual Statistics at Point Petre (1997) .....	55
TABLE 44	VOC Annual Statistics at Sarnia (1997) .....	58
TABLE 45	VOC Annual Statistics at Simcoe (1997) .....	61
TABLE 46	VOC Annual Statistics at Stouffville (1997) .....	64
MAP 1	Location of Provincial Regional Boundaries (1997) .....	67
MAP 2	Location of Provincial Continuous SO <sub>2</sub> Air Monitoring Stations (1997) .....	68
MAP 3	Location of Provincial Continuous SP(as COH) Air Monitoring Stations (1997) .....	69
MAP 4	Location of Provincial Continuous TRS Air Monitoring Stations (1997) .....	70
MAP 5	Location of Provincial Continuous CO Air Monitoring Stations (1997) .....	71
MAP 6	Location of Provincial Continuous NO <sub>2</sub> Air Monitoring Stations (1997) .....	72
MAP 7	Location of Provincial Continuous O <sub>3</sub> Air Monitoring Stations (1997) .....	73
MAP 8	Location of Provincial Continuous PM <sub>10/2.5</sub> Air Monitoring Stations (1997) .....	74
MAP 9	Location of Provincial Continuous AQI Air Monitoring Stations (1997) .....	75
MAP 10	Location of Provincial 24-Hour TSP Air Monitoring Stations (1997) .....	76
MAP 11	Location of Provincial 24-Hour PM <sub>10</sub> Air Monitoring Stations (1997) .....	77
MAP 12	Location of Provincial Continuous MET Air Monitoring Stations (1997) .....	78



## **INTRODUCTION**

This appendix is intended for use in conjunction with the annual report Air Quality in Ontario 1997. Appendix A briefly describes the provincial air monitoring network, the quality assurance and quality control procedures and data base. Appendix B provides a series of tables showing the station locations as well as a listing of the summary statistics including, means, maxima, percentile values and the number of exceedances of the Ontario criteria for each pollutant.

## **APPENDIX A - Monitoring Network Operations**

### **Network Description**

In 1971, the provincial air monitoring network consisted of 254 instruments: 166 continuous analyzers at 76 monitoring sites and 88 sites with high-volume samplers. By 1980, the provincial network had reached its maximum size at 450 instruments of which 268 were continuous analyzers at 106 sites and 182 high-volume samplers. During 1997, the network consisted of 224 continuous monitoring instruments at 74 sites, 53 high-volume samplers, 24 daily PM<sub>10</sub> samplers and 22 real-time PM<sub>10/2.5</sub> monitors.

Ministry regional boundaries along with the Regional, area and district head office locations are shown in Map 1.

More than 60% of all air monitoring by the ministry is source-specific and is the principal responsibility of operations division. For the most part, the operation of the monitoring stations and the collection of air samples is conducted by the regional staff. Environmental Monitoring and Reporting Branch operates the Greater Toronto Area (ambient stations) network and the mobile air monitoring units. The monitoring networks are classified by their functions: continuous air monitoring stations; non-continuous sampling sites; the toxic networks; and mobile air monitoring.

### **Quality Assurance and Quality Control**

In 1997, each region had an atmospheric and terrestrial effects unit responsible for the day-to-day air monitoring and maintenance.

Each day, the instruments are checked through a computerized telephone link by technicians confirming the automatic zero and span values (that is, a known value for a particular gas).

Regional technicians inspect and maintain the monitoring equipment and stations continually. If an instrument undergoes major servicing, the instrumentation and quality assurance unit will re-calibrate it.

Portable calibration equipment is used by regional staff. This equipment itself is re-calibrated at least twice per year.

There are other monitoring programs, such as those operated by the Lambton Industrial Society, Environment Canada and Ontario Hydro, which the ministry either audits or conducts comparisons with. It uses data from these services to judge provincial air quality.

The environmental monitoring and reporting branch operates a laboratory with gas reference standards that adhere to those of the U.S. National Institute of Standards and Technology (NIST) as well as to the pollution measurement division of Environment Canada.

Performance audits are conducted on the sulphur dioxide, nitrogen oxides/nitrogen dioxide, ozone and total reduced sulphur (as hydrogen sulphide) monitors approximately three times per year and on

carbon monoxide monitors once per year.

Chemical analyses performed by the laboratory services branch are also subject to quality assurance and control.

The ambient air quality monitoring network undergoes constant maintenance to ensure a high standard of quality control.

Continuous real-time and particulate data are reviewed, assessed and validated constantly by regional staff and staff of the environmental monitoring and reporting branch.

Actions are taken immediately to correct anything that may affect the validity of the data.

These measures ensure that ambient air monitoring data are valid, complete, comparable, representative and accurate.

In 1997, continuous air monitoring instruments were given 622 performance audits. Approximately 86 per cent of the audits were found to be in the acceptable performance criterion, i.e. measured values were within 10 per cent of the standard. For the remaining 14 per cent which fell outside the 10 per cent range, station log records and backup charts were consulted to adjust the data to reflect true ambient concentrations. As a result, the network for 1997 had 94.1 per cent valid data out of approximately 4 million data points.

## **Data Base**

The ambient air quality data used in this report are stored in the ministry's air quality information system (AQUIS). Approximately 4 million air pollution measurements are added to AQUIS yearly, with the vast majority representing Ontario's more heavily populated urban areas.

A statistical pattern test is used to identify data anomalies, such as unusual pollutant concentrations. Each pollutant has a predetermined pollutant concentration range based on historical data. Values outside this range are flagged for further investigation.

AQUIS data are divided into two major groupings: continuous (1-hour) measurements and daily (24-hour) measurements.

Hourly data are obtained from automated ambient air monitoring instruments which operate continuously. These produce an average measurement each hour for a possible total of 8760 measurements in a year.

SO<sub>2</sub>, SP (as COH), CO, NO<sub>x</sub>/NO/NO<sub>2</sub>, O<sub>3</sub> and TRS compounds are all measured hourly. A valid annual mean requires at least 5840 hourly readings or 67 per cent valid data. Typically the network yields approximately 95 per cent valid data.

The instruments which provide daily measurements from a 24-hour sampling period are usually operated on one, three or six-day sampling cycles. They measure TSP, PM<sub>10</sub>, lead, various trace metals, sulphate and nitrate.

For daily data, a valid annual mean requires at least two thirds of the total number of possible samples, i.e., a station operating on a 6-day sampling schedule would require at least 40 out of a possible 61 samples.

To be included in the 10-year trend analysis, a site must have valid annual means for at least 8 out of the 10 years 1988-1997. To be included in long term analysis a site must have a valid annual for at least 21 out of the 27-years, 1971-1997.



## APPENDIX B - Network Descriptive Tables and Annual Statistics

The entire continuous (hourly) network is summarized in Table A1 and Maps 2-9. The table gives station name, numerical identifier, and pollutants measured. The numerical identifier is the station (ID) number, the first digit of which identifies the geographic region in which the station is located.

The column headings for the continuous pollutants are as follows:

SO <sub>2</sub>	(sulphur dioxide)
SP	(suspended particles as measured by COH)
TRS	(total reduced sulphur compounds)
CO	(carbon monoxide)
NO <sub>2</sub>	(nitrogen dioxide)
NO <sub>x</sub>	(oxides of nitrogen)
NO	(nitric oxide)
O <sub>3</sub>	(ozone)
PM <sub>10</sub> /PM <sub>2.5</sub>	(real-time inhalable/respirable particles)
API	(air pollution index)
AQI	(air quality index)

The particulate (daily) network is summarized in Table A2 and Map 10. The table gives station name, numerical identifier, and pollutants measured. Numerals indicate the monitoring cycle frequency in days. Some additional codes are defined in the key at the top of the table. The column headings for the noncontinuous pollutants are as follows:

TSP	(total suspended particles)
Cu	(copper in TSP)
Cr	(chromium in TSP)
Fe	(iron in TSP)
Mn	(manganese in TSP)
Ni	(nickel in TSP)
Pb	(lead in TSP)
V	(vanadium in TSP)
NO <sub>3</sub> <sup>-</sup>	(nitrate in TSP)
SO <sub>4</sub> <sup>2-</sup>	(sulphate in TSP)

The inhalable particle (PM<sub>10</sub>) network is summarized in Table A3 and Map 11. This table gives the station location, parameters measured and frequency of sampling.

The meteorological network is summarized in Table A-4 and Map 12. This table gives station name, numerical identifier, meteorological parameters measured and the height of the measurements.

The 1997 statistical data for the various pollutants are provided in Tables A5 through A28. The 10-year trends are presented in tables A-30 to A-38. The stations used in the 10-year trends are listed in Table A39.



## ABBREVIATIONS

ID	- five digit provincial station identification number
TYP	- survey type
YR	- year monitoring began
LAT	- station latitude in degrees/minutes
LONG	- station longitude in degrees/minutes
ELEV	- elevation of sampling inlet (metres above ground)
INS	- insufficient data to compute relevant statistics

TABLE 1 ONTARIO CONTINUOUS AIR MONITORING NETWORK FOR 1997

CITY	STATION NAME	ID	TYP	YR	LAT	LONG	ELEV (M)	S02	COH	C0	O3	NO2/NOX NO	PM10/2.5	TRS	API	AQI	ELEV = AIR INTAKE HEIGHT ABOVE GROUND LONG = LONGITUDE(DEGREES MINUTES)	
T = TELEMETRY YR = YEAR STATION BEGAN TYP = AMBIENT SURVEY, I SOURCE SPECIFIC SURVEY																		
ID = STATION IDENTIFICATION NUMBER LAT = LATITUDE(DEGREES MINUTES) ELEV = AIR INTAKE HEIGHT ABOVE GROUND LONG = LONGITUDE(DEGREES MINUTES)																		
WINDSOR	WRIGHT/WATER ST	12007	I	84	42 17	83 06	4	T	T	T	T	T	T	T	T	T	T	
	467 UNIVERSITY AV W	12008	A	69	42 19	83 03	8	T	T	T	T	T	T	T	T	T	T	
	COLLEGE/SOUTH ST	12016	A	75	42 18	83 04	4	T	T	T	T	T	T	T	T	T	T	
	MOE WATER PUMP STN, MIDDLE RD	13021	A	77	42 15	82 13	4	T	T	T	T	T	T	T	T	T	T	
MERLIN	HWY40 (OPP LAMBTON GS)	14016	I	69	42 48	82 29	4	T	T	T	T	T	T	T	T	T	T	
SARNIA	CENTENNIAL PK FRONT ST(N TRACKS	14064	A	76	42 59	82 24	3	T	T	T	T	T	T	T	T	T	T	
	CONCESSION RD 26	14118	A	77	42 56	82 14	4	T	T	T	T	T	T	T	T	T	T	
	LONGWOODS CONSERVATION AUTH	15009	A	83	42 53	81 29	4	T	T	T	T	T	T	T	T	T	T	
	PUC BUILDING	15013	A	83	43 10	81 41	5	T	T	T	T	T	T	T	T	T	T	
GRAND BEND	POINT BLAKE (CONSERVATION AREA)	15020	A	91	43 20	81 44	4	T	T	T	T	T	T	T	T	T	T	
LONDON	900 HIGHBURY AVE	15025	A	95	42 59	81 13	4	T	T	T	T	T	T	T	T	T	T	
	CONCESSION RD 2 LOT A	18007	A	79	44 18	81 35	4	T	T	T	T	T	T	T	T	T	T	
	EXPERIMENTAL FARM	22071	A	75	42 51	80 16	4	T	T	T	T	T	T	T	T	T	T	
	CHEAPSIDE RD(1 KM S OF HWY 3)	22086	I	77	42 52	80 00	5	T	T	T	T	T	T	T	T	T	T	
LONG POINT	PROVINCIAL PARK	22901	A	79	42 35	80 23	4	T	T	T	T	T	T	T	T	T	T	
NANTICOKE	WALPOLE S PS, SANDUSK RD	22904	I	79	42 50	80 02	4	T	T	T	T	T	T	T	T	T	T	
	RAINFHAM RD (NEAR STEEL CO GATE)	22907	I	84	42 49	80 05	4	T	T	T	T	T	T	T	T	T	T	
	WEST AVERDEWOOD	26060	A	90	43 26	80 30	5	T	T	T	T	T	T	T	T	T	T	
	ARGYLE CRESCENT	27067	A	87	43 10	79 14	4	T	T	T	T	T	T	T	T	T	T	
HAMILTON	ST CATHARINES	29000	A	87	43 15	79 52	4	T	T	T	T	T	T	T	T	T	T	
	ELDONKELLY	29000	A	87	43 15	79 52	4	T	T	T	T	T	T	T	T	T	T	
	BARTON/NORTH	29025	I	69	43 16	79 51	4	T	T	T	T	T	T	T	T	T	T	
	467 BEACH BLVD	29102	I	84	43 17	79 47	4	T	T	T	T	T	T	T	T	T	T	
HAMILTON	VICKERS RDEAST 8TH ST	29114	A	85	43 14	79 52	3	T	T	T	T	T	T	T	T	T	T	
	MAIN ST/W HWY 403	29118	A	85	43 15	79 54	3	T	T	T	T	T	T	T	T	T	T	
	JJ CASE	29531	I	96	43 29	79 55	3	T	T	T	T	T	T	T	T	T	T	
	PIER 2/BEACH STRIP	29547	I	92	43 27	79 78	4	T	T	T	T	T	T	T	T	T	T	
HAMILTON	HOMESIDE	29561	I	95	43 21	79 66	4	T	T	T	T	T	T	T	T	T	T	
	CN TOWER	31100	A	89	43 35	79 23	444	T	T	T	T	T	T	T	T	T	T	
	QUEEN/UNIVERSITY	31003	A	90	43 39	79 23	3	T	T	T	T	T	T	T	T	T	T	
	LAWRENCE/KENNEDY	33003	A	70	43 45	79 16	4	T	T	T	T	T	T	T	T	T	T	
SCARBOROUGH	HENDON AVE (YONGE ST/FINCH AVE)	34020	A	88	43 47	79 25	5	T	T	T	T	T	T	T	T	T	T	
	ELMCREST RD (CENTENNIAL PK)	35003	A	69	43 39	79 35	5	T	T	T	T	T	T	T	T	T	T	
	EVANS/ARNOLD AV	35033	A	67	43 37	79 31	5	T	T	T	T	T	T	T	T	T	T	
	CLEARVIEW HEIGHTS	36030	A	88	43 42	79 29	5	T	T	T	T	T	T	T	T	T	T	
YORK	HWY2/NORTH SHORE BLVD E	44008	A	79	43 19	79 48	5	T	T	T	T	T	T	T	T	T	T	
	BRONTE RD/NOBURN CRES	44015	A	80	43 24	79 44	5	T	T	T	T	T	T	T	T	T	T	
	PS, RITSON RD/OLIVE AV	45025	A	79	43 53	78 51	5	T	T	T	T	T	T	T	T	T	T	
	QUEENSWAY WILBURTONARIO ST	46110	A	77	43 34	79 37	5	T	T	T	T	T	T	T	T	T	T	
MISSISSAUGA	MEADOW PK, APPLE LANE C C	46117	I	87	43 31	79 36	5	T	T	T	T	T	T	T	T	T	T	
	HWY47/E OF HWY48	48002	A	74	43 58	79 16	5	T	T	T	T	T	T	T	T	T	T	
	HWY 117/PAINT LAKE ROAD	49010	A	81	45 13	78 56	3	T	T	T	T	T	T	T	T	T	T	
	MCD GDS, RIDEAU/WURTEMBERG ST	51001	A	71	45 26	75 41	4	T	T	T	T	T	T	T	T	T	T	
OTTAWA	133 DALTON STREET	52020	A	88	44 14	76 31	5	T	T	T	T	T	T	T	T	T	T	
	MEMORIAL PK, BEDFORD/THIRD STS	56051	A	70	45 01	74 44	4	T	T	T	T	T	T	T	T	T	T	
	SCHOOL, 435 SECOND ST W	56068	I	75	45 01	74 44	6	T	T	T	T	T	T	T	T	T	T	

**TABLE 1 ONTARIO CONTINUOUS AIR MONITORING NETWORK FOR 1997**

T = TELEMETRY    YR = YEAR STATION BEGAN    ID = STATION IDENTIFICATION NUMBER    ELEV = AIR INTAKE HEIGHT ABOVE GROUND  
 TYP = AMBIENT SURVEY; I SOURCE SPECIFIC SURVEY    LAT = LATITUDE(DEGREES MINUTES)    LONG = LONGITUDE(DEGREES MINUTES)

CITY	STATION NAME	ID	TYP	YR	LAT	LONG	ELEV (M)	S02	COH	CO	O3	NO2/NOX NO	PM10/2.5	TRS	API	AQI
PETERBOROUGH	MOEE LANSDownIE ST	59006	A	76	44 16	78 21	7									
DRYDEN	35 VAN HORNE AV	61027	I	84	49 47	92 50	15				T			T		
FORT FRANCES	PORTAGE/CHURCH ST	62010	I	76	48 17	93 24	4							T		
FORT FRANCES	CEMETERY COLONIZATION RD W	62012	I	76	48 17	93 25	5							T		
INT'L FALLS	U.S. CUSTOMS BLDG	62045	I	97			4	T						T		
FORT FRANCES	EIGHTH ST/CORNWALL AVE	63047	I	90	48 37	93 24	4							T		
FORT FRANCES	ROBERT RODREY'S	62200	A	97	48 38	92 23	3		T					T		
MARATHON	WATER TOWER	63041	I	91	48 43	86 23	4							T		
THUNDER BAY	CAN-CAC, MONTREAL ST	63046	I	76	48 21	89 18	3							T		
RED ROCK	RECREATION CENTRE	63084	I	81	48 57	88 15	7							T		
TERRACE BAY	ST MARTIN SCHOOL	63090	I	81	48 47	87 06	8							T		
TERRACE BAY	TERRACE HEIGHT DR	63092	I	81	48 48	87 04	4							T		
THUNDER BAY	MOT 613 JAMES ST S	73260	A	86	48 23	89 17	3	T	T	T	T			T	T	T
SAULT STE MARIE	WILKINSONFIELD SCHOOL	71068	A	87	45 32	84 21	3	T	T	T	T			T	T	T
WAWA	SUPERIOR AVE	71077	I	94	47 39	84 38	5	T								
NORTH BAY	CHIPPEWA STREET	75010	A	79	46 19	79 27	4		T							T
SUDBURY	SKEDAD	77012	I	52	46 39	80 46	4	T								
SUDBURY	HANMER	77013	I	71	46 39	80 57	5	T								
SUDBURY	WATER TANK ASH ST	77016	I	69	46 30	81 00	3	T								
CONISTON	GOVERNMENT ROAD/EDWARD ST	77028	I	74	46 29	80 51	4	T								
GARSON	FALCONBRIDGE ROAD	77065	I	76	46 34	80 51	4	T								
NEW SUBURBY	KENNEDY STREET	77075	I	76	46 31	80 57	4	T								
SUDBURY	LONG LAKE ROAD (VILLA LOYOLA)	77096	I	80	46 24	81 01	4	T								
SUDBURY	MIKKOLA (J. HAMILTON SCHOOL)	77201	I	82	46 25	81 07	4	T								
SUDBURY	SCIENCE NORTH	77203	A	84	46 28	80 59	15	T	T	T	T	T		T	T	T
RAYSIDE	ST LAURENT/REGIONAL RD	77206	I	85	46 36	81 06	4	T								
COPPER CLIFF	MARKET STREET	77218	I	87	46 28	81 04	4	T								
SUDBURY	ROBINSON SCHOOL	77225	I	90	46 28	81 00	4	T								
SUDBURY	DOZZI PARK	77228	I	93	46 28	81 02	4	T								
TOTALS:								51	33	20	39	28	22	31	25	27

**LEGEND:**

S02 - Sulphur Dioxide  
 COH - Coefficient of Haze  
 CO - Carbon Monoxide  
 O3 - Ozone  
 NO2 - Nitrogen Dioxide  
 NO - Nitric Oxide  
 NOX - Oxides of Nitrogen  
 TRS - Total Reduced Sulphur  
 API - Air Pollution Index  
 AQI - Air Quality Index  
 PM10/2.5 - Inhalable/Respirable Particulate (T\* is PM2.5)



TABLE 2 ONTARIO NONCONTINUOUS AIR MONITORING NETWORK FOR 1997

TYPE = A AMBIENT SURVEY; I SOURCE SPECIFIC SURVEY										ELEV = AIR INTAKE HEIGHT ABOVE GROUND (METERS)											
LAT = LATITUDE(DEGREES, MINUTES)										LONG = LONGITUDE(DEGREES, MINUTES)											
CITY	STATION NAME	ID	TYPE	VR	LAT	LONG	ELEV	TSP	Cd	Cr	Cu	Fe	Mn	Ni	Pb	V	NO3	SO4	Cl	C	RAD
(M)																					
ST MARYS	309 THOMAS ST	11001	I	79	43 15	81 09	3	6													
	WRIGHT/WATER ST	12007	I	84	42 17	83 06	4	6	6	6	6	6	6	6	6	6	6	6	6	6	6
	WINDSOR	12008	A	70	42 19	83 03	8	6	6	6	6	6	6	6	6	6	6	6	6	6	6
	467 UNIVERSITY AV W	12011	I	88	42 19	83 00	5	6	6	6	6	6	6	6	6	6	6	6	6	6	6
	WINDSOR	12013	I	71	42 19	83 00	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6
WINDSOR	FLTRAT PLT 3665 WYANDOTTE STE	12015	I	71	42 17	83 05	5	6	6	6	6	6	6	6	6	6	6	6	6	6	6
	SEWAGE STN, HWY 18 PROSPECT	12016	A	75	42 18	83 04	4	6	6	6	6	6	6	6	6	6	6	6	6	6	6
	WINDSOR	12018	I	78	42 17	83 01	4	6	6	6	6	6	6	6	6	6	6	6	6	6	6
	2885 HOWARD AVE	12053	I	81	42 08	83 07	11	6													6
	WINDSOR	12055	I	91	42 07	83 06	1	6													6
WINDSOR	COLUMBUS CENTRE	12058	I	93	42 17	83 01	5	6	6	6	6	6	6	6	6	6	6	6	6	6	6
	BRENTWOOD CENTRE	12060	I	95	42 17	83 01	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6
	WINDSOR	12061	I	95	42 18	83 02	6	6	6	6	6	6	6	6	6	6	6	6	6	6	6
	CITY YARD	14016	I	69	42 48	82 29	4	6	6	6	6	6	6	6	6	6	6	6	6	6	6
	WINDSOR	14030	I	78	42 53	82 17	1	6	6	6	6	6	6	6	6	6	6	6	6	6	6
SARNIA	R.R. #1 (W OF HOUSE)	14151	I	79	42 59	82 24	4	6													
	DAVID/FRONT ST	15025	A	96	42 61	81 16	4	6	6	6	6	6	6	6	6	6	6	6	6	6	6
	WINDSOR	17014	I	74	43 05	80 50	2	6													
	WINDSOR	17020	I	81	43 04	81 49	-4	6													
	WINDSOR	17021	I	83	43 06	81 58	1	6													
BEACHVILLE	OXFORD CITY RD 6 (HESTON FARM)	17015	I	89	43 05	80 50	4	6													
	26 VINE ST (MOE TRAILER)	17215	I	89	43 04	80 50	4	6													
	BEACHVILLE	17315	I	89	43 04	80 50	4	6													
	BEACHVILLE	18007	I	80	44 18	81 32	2														1
	WINDSOR	18008	I	80	44 18	81 32	2														1
TIVERTON	CONCESSION RD 4 LOT D	18009	I	80	44 19	81 32	2														1
	CONCESSION RD 6 LOT E	18010	I	80	44 20	81 30	2														1
	TIVERTON	18011	I	80	44 21	81 30	2														1
	CONCESSION RD 10 LOT F	22092	I	85	42 49	80 02	4	6													6
	WINDSOR	22904	I	84	42 50	80 02	4	6													6
NANTICOKE	WALPOLE S.P.S. SANDUSK RD	22907	I	84	42 49	80 05	4	6													6
	RAINHAM RD (NEAR STELCO GATE)	22964	I	84	42 50	80 05	4	6													6
	NANTICOKE	26044	I	97	43 26	80 30	4	6													
	KITCHENER	26046	I	97	43 26	80 31	4	6													
	KITCHENER	27045	I	78	42 58	79 15	1	6													6

TABLE 2 ONTARIO NONCONTINUOUS AIR MONITORING NETWORK FOR 1997

CITY	STATION NAME	ID	TYPE	VR	LAT	LONG	ELEV (M)	TSP	Cd	Cr	Cu	Fe	Mn	Ni	Pb	V	NO3	SO4	Cl	C	RAD	TYPE - A - AMBIENT SURVEY; I - SOURCE SPECIFIC SURVEY		LONG - AIR INTAKE HEIGHT ABOVE GROUND (METERS)																				
																						LAT - LATITUDE (DEGREES MINUTES)		LONG - LONGITUDE (DEGREES MINUTES)																				
THOROLD	185 QUEEN ST S	27052	I	82	43 07	79 12	1	6	6	6	6	6	6	6	6	6																												
NiAGARA FALLS	SIP GROUNDS, STANLEY AV	27055	I	82	43 08	79 05	4	6																																				
HAMILTON	ELGIN/KELLY	29000	A	88	43 15	79 52	4	6																																				
HAMILTON	KENILWORTH	29009	I	69	43 15	79 49	6	6																																				
HAMILTON	BURLINGTON/LEDS	29011	I	73	43 16	79 49	5	6	6	6	6	6	6	6	6	6	6	6	6	6	6																							
HAMILTON	BURLINGTON/WELLINGTON	29012	I	73	43 16	79 59	7	6																																				
HAMILTON	BARTONS/ANFORD	29025	I	69	43 16	79 51	4	6	6	6	6	6	6	6	6	6	6	6	6	6	6																							
HAMILTON	467 BEACH BLVD	29102	I	85	43 17	79 47	4	6	6	6	6	6	6	6	6	6	6	6	6	6	6																							
GREENSVILLE	OFIELD RD/HWY 5	29111	I	86	43 18	79 59	1	6																																				
HAMILTON	GRETRIDGE/HPPW	29113	I	86	43 15	79 49	4	6																																				
HAMILTON	VICKERS RD/EAST 1811 ST	29114	A	85	43 14	79 52	3	6	6	6	6	6	6	6	6	6	6	6	6	6	6																							
HAMILTON	MAIN ST/HWY 403	29118	A	85	43 15	79 54	3	6																																				
HAMILTON	MORLEY ST/PARKDALE AV	29119	I	86	43 15	79 47	4	6																																				
HAMILTON	DUNDURN/YORK	29122	I	87	43 16	79 53	10	6																																				
HAMILTON	KEEFER COURT/MORE LAB	29143	I	92	43 24	79 76	4	6																																				
TORONTO	BRUCE PS, 51 LARCHMOUNT AV	31015	I	86	43 40	79 20	6	1							1																													
TORONTO	MOSLEY/LESLIE STS	31058	I	73	43 40	79 20	5	1	1	1	1	1	1	1	1	1																												
TORONTO	A R CLARKE CO. 633 EASTERN AVE	31065	I	87	43 40	79 20	12	1							1																													
TORONTO	WORKS DEPT. 138 HAMILTON AV	31082	I	74	43 40	79 21	5	1							1																													
MISSISSAUGA	2160 DIXIE RD	46047	I	95	43 36	79 35	1	6	6	6	6	6	6	6	6	6	6	6	6	6	6																							
MISSISSAUGA	MEADOW PARK, APPLE LANE C C	46117	I	87	43 31	79 36	5	6	6	6	6	6	6	6	6	6	6	6	6	6	6																							
HUNTERDAY	BOMBARDIER, MONTREAL ST	63046	I	78	48 21	80 18	3	6																																				
SAULT STE MARIE	PUMPHOUSE, BONNEY ST	71042	I	75	46 31	84 23	2	6	6	6	6	6	6	6	6	6	6	6	6	6	6			6																				
HEARST	FRONTIQUION ST	72083	I	90	49 41	83 18	2	6																																				
TOTALS								53	22	22	22	22	22	22	25	22	13	13	7	6	10																							
LEGEND																																												
TSP - Total Suspended Particulate																																												
Cd - Cadmium																																												
Cr - Chromium																																												
Cu - Copper																																												
Fe - Iron																																												
Mn - Manganese																																												
Ni - Nickel																																												
Pb - Lead																																												
V - Vanadium																																												
NO3 - Nitrate																																												
SO4 - Sulphate																																												
Cl - Chlorine																																												
SB - Antimony																																												
C - Carbon																																												
RAD - Radiation																																												

TABLE 3 ONTARIO INHALABLE PARTICLE (PM<sub>10</sub>) 24-HOUR NETWORK FOR 1997

ID - STATION ID  
ELEV - AIR INTAKE HEIGHT ABOVE GROUND (METERS)

YR - YEAR MONITORING BEGAN;  
LAT - LATITUDE(DEGREES:MINUTES); LONG - LONGITUDE(DEGREES:MINUTES)  
TYPE - AMBIENT SURVEY; 1 - SOURCE SPECIFIC SURVEY

CITY	STATION NAME	ID	Yr	Type	LAT	LONG	(M)	IP	Cu	Fe	Mn	Pb	Cr	Cd	V	Ni	SO <sub>4</sub>
WINDSOR	WRIGHT/WATER STREET	12507	90	1	42 17	82 16	4	6	6	6	6	6	6	6	6	6	6
WINDSOR	407 UNIVERSITY AVE WEST	12508	89	A	42 19	83 02	8	6	6	6	6	6	6	6	6	6	6
WINDSOR	3665 WYANDOTT ST. E.	12511	92	1	42 19	83 00	6	6	6	6	6	6	6	6	6	6	6
SARNIA	611 HURON, MOORE TWP	14550	97	1	42 58	82 24	3	6	6	6	6	6	6	6	6	6	6
SARNIA	CENTENNIAL PK/FRONT STREET	14564	97	A	42 59	82 24	3	6	6	6	6	6	6	6	6	6	6
LONDON	900 HIGHBURY AVE EAST	15525	90	A	42 57	81 13	4	6	6	6	6	6	6	6	6	6	6
NANTICOK	WALPOLE S.P.S., SANDUSK RD	22104	92	1	42 50	80 02	4	6	6	6	6	6	6	6	6	6	6
ST CATHARINES	KING ST	27108	91	1	43 10	79 15	12	6	6	6	6	6	6	6	6	6	6
HURON	185 QUEEN ST. SOUTH	27152	90	1	43 07	79 12	1	6	6	6	6	6	6	6	6	6	6
HAMILTON	ELGIN/KINGLY STREET	29100	90	A	43 15	79 52	4	6	6	6	6	6	6	6	6	6	6
HAMILTON	DEACON RD	29102	89	1	43 17	79 47	4	6	6	6	6	6	6	6	6	6	6
HAMILTON	GERRARD/DEACON STREET	29113	90	1	43 15	79 49	4	6	6	6	6	6	6	6	6	6	6
HAMILTON	BUCHANAN PARK P.S.	29124	92	1	43 14	79 51	4	6	6	6	6	6	6	6	6	6	6
TORONTO	BAY ST/GROSVENOR AVE	31127	89	A	43 40	79 23	3	6	6	6	6	6	6	6	6	6	6
LEEDS	EVANS/ARNOLD AVENUE	35127	90	A	43 17	79 31	1	6	6	6	6	6	6	6	6	6	6
OAKVILLE	BRONTE RD/MOHN CRIS	44127	92	1	43 24	79 44	5	6	6	6	6	6	6	6	6	6	6
MISSISSAUGA	MEADOWOOD PK, APPLE LANE C.C.	46127	93	A	43 11	79 16	1	6	6	6	6	6	6	6	6	6	6
CORNWALL	MEMORIAL PK, BEDFORD/THIRD STS	56051	92	A	45 01	74 44	4	6	6	6	6	6	6	6	6	6	6
FORT FRANCES	250 CHURCH STREET	62115	92	1	48 16	91 23	9	6	6	6	6	6	6	6	6	6	6
HUNTERDALE	615 JAMES ST. SOUTH	63201	89	A	48 21	89 17	4	6	6	6	6	6	6	6	6	6	6
SAULT STE MARIE	PUMPHOUSE/BONNEY STREET	71142	89	1	46 11	84 23	2	6	6	6	6	6	6	6	6	6	6
SAULT STE MARIE	W.M. McFARLAND SCHOOL	71168	90	A	46 12	84 21	3	6	6	6	6	6	6	6	6	6	6
SUDBURY	LINGAN ST	77326	91	A	46 29	80 59	8	6	6	6	6	6	6	6	6	6	6
COPPER CLIFF	MARKET STREET	77570	96	1	46 18	81 04	4	6	6	6	6	6	6	6	6	6	6
TOTALS:							24	24	24	24	24	24	24	24	24	24	24

Notes: Samplers operate on a 6-day sampling cycle

LEGEND:

- IP - Inhalable Particle
- Cr - Chromium
- Cu - Copper
- Fe - Iron
- Mn - Manganese
- SO<sub>4</sub> - Sulphate
- Pb - Lead
- V - Vanadium
- Ni - Nickel





TABLE 5 Sulphur Dioxide (SO<sub>2</sub>) Statistics (1997)

Unit: parts per billion (ppb)

Stn #	City	Location	P E R C E N T I L E S							# of times above Criteria		
			Valid hrs	10%	30%	50%	90%	99%	Mean	Maximum 1h	24h	1y
12007	Windsor	Wright/Water St	8610	2	5	8	12	24	54	10.9	43.5	0
12008	Windsor	467 University Av W	8551	0	2	4	7	17	39	6.7	77	0
12016	Windsor	College/South St	7670	0	4	7	13	28	86	12.5	543	1
14016	Courtright	Hwy40 (OPP Lambton GS)	7953	2	4	5	8	16	69	8.5	196	0
14064	Sarnia	Centennial Pk, Front St/Ch Tracks	8576	0	1	2	5	20	108	8.7	245	0
15025	London	900 Highway Ave.	8626	0	1	2	3	6	13	2.5	49	0
18007	Tiverton	Concession Rd 2 Lot A	8670	0	1	1	2	5	13	2.0	37	0
22071	Sincoe	Experimental Farm	8340	1	1	2	3	7	17	3.2	71	0
22086	Nanticoke	Cheapside Rd(3 Km S of Hwy 3)	8733	0	1	2	4	11	34	4.4	148	0
22901	Long Point	Provincial Park	8115	0	1	2	3	6	18	2.7	83	0
22904	Nanticoke	Walpole S Ps Sandusk Rd	2181	1	3	4	7	15	35	INS	76	0
22907	Nanticoke	Rainham Rd (Near Stelco Gate)	8579	0	1	2	5	12	40	5.0	122	0
26060	Kitchener	West Ave/Homewood	8662	1	1	2	3	7	16	3.1	52	0
27067	St Catharines	Argyle Cres (Pump Stn)	8383	0	2	4	7	13	25	5.8	47	0
29000	Hamilton	Elgin/Kelly St	8743	1	2	4	6	14	36	5.8	83	0
29025	Hamilton	Barton/Wentworth	8297	1	2	4	6	14	38	6.0	101	0
29102	Hamilton	467 Beach Blvd	6967	1	4	6	11	32	81	12.1	165	0
29114	Hamilton	Vickers Rd/East 18Th St	8387	1	2	3	5	12	31	5.2	62	0
29118	Hamilton	Main St W/Hwy403	7759	0	2	3	6	12	25	4.9	60	0
31303	Toronto	Toronto (Osgoode)	8443	1	3	4	6	10	21	5.3	64	0
33003	Scarborough	Lawrence/Kennedy	8339	2	3	4	6	10	19	5.2	37	0
34020	North York	Hendon Ave (Yonge/Finch)	8256	1	2	3	5	9	21	4.4	74	0
35003	Ethioko	Elmcrest Rd (Centennial Pk)	8346	2	3	4	5	9	21	4.9	130	0
35033	Ethioko	Evans/Arnold Av	8568	2	3	4	6	10	21	5.2	74	0
36030	York	Clearview Ht. GS/Keede St	8460	1	2	4	6	10	28	5.2	95	0
44008	Burlington	Hwy2/North Shore Blvd E	8478	2	3	4	6	9	21	5.1	60	0
44015	Oakville	Bronte Rd/Wabum Cres	8662	1	2	3	5	10	24	4.8	59	0
45025	Oshawa	Ps Rison Rd/Olive Av	8496	1	2	4	5	9	19	4.6	58	0
46110	Mississauga	Queensway W/Hurontario St	2491	2	3	4	6	10	22	INS	44	0
46117	Mississauga	Meadow Pk, Apple Lane Club	8680	1	2	3	4	8	20	3.8	47	0
48002	Stouffville	Hwy47/E of Hwy48	6048	1	2	2	4	6	15	3.3	84	0
49010	Dorset	Hwy 117/Paint Lake Rd	8493	0	0	1	2	3	10	1.4	99	0
51001	Ottawa	Med Gds, Rideau/Wortemburg St	8632	2	5	6	7	10	18	6.3	67	0

TABLE 5 Sulphur Dioxide (SO<sub>2</sub>) Statistics (1997)

Unit: parts per billion (ppb)

Stn #	City	Location	Valid hrs	P E R C E N T I L S								Maximum		# of times above Criteria		
				10%	30%	50%	70%	90%	99%	Mean	1h	24h	1h	24h	1y	
56051	Conwall	Memorial Pk Bedford/Third	8760	0	1	2	4	8	34	3.9	141	39.6	0	0	0	
62045	Int'l Falls	US Customs Bldg	8662	0	0	0	0	0	2	0.1	55	5.0	0	0	0	
63200	Thunder Bay	MOT 615 James St S	8613	0	0	0	0	1	6	0.4	28	3.8	0	0	0	
71068	Sault Ste Marie	Wm. Merrifield School	8707	0	0	0	1	4	34	2.1	81	26.7	0	0	0	
71077	Wawa	Superior Ave/Tamarack Ave	8270	0	0	0	0	2	86	2.9	467	67.8	14	0	0	
77012	Sudbury	Skead	8689	0	1	2	3	9	86	5.9	526	79.3	6	0	0	
77013	Sudbury	Hamner	8729	0	0	1	2	4	52	2.9	246	41.8	0	0	0	
77016	Sudbury	Water Tank Ash St	8746	0	1	1	3	15	74	6.1	359	46.8	8	0	0	
77028	Coniston	Government Rd/Edward St	8741	0	0	1	2	7	82	4.4	550	68.0	4	0	0	
77065	Garson	Falconbridge Rd	8505	0	0	1	2	8	59	4.1	360	38.6	2	0	0	
77075	New Sudbury	Kennedy St	8690	0	0	1	2	9	68	4.7	320	49.7	2	0	0	
77096	Sudbury	Long Lake Rd (Villa Loyola)	8731	0	1	1	3	8	73	4.7	493	51.3	2	0	0	
77201	Sudbury	Mikkola (J. Hamilton School)	8710	0	0	1	2	5	62	3.7	594	68.2	3	0	0	
77203	Sudbury	Science North	8586	0	0	1	2	6	59	3.5	256	61.3	1	0	0	
77206	Rayside	St Laurent/Regional Rd	8751	0	0	1	1	4	27	1.9	379	32.7	1	0	0	
77218	Copper Cliff	Market St	8668	0	0	1	2	10	96	6.1	1170	101.8	15	1	0	
77225	Sudbury	Robinson School	4235	0	0	1	2	8	73	INS	396	63.4	5	0	INS	
77228	Sudbury	Dozzi Park	8646	0	0	1	2	7	58	3.8	435	39.6	5	0	0	



**Table 6 Suspended Particles (SP) Statistics (1997)**  
**Unit: COHS/1000 FT**

Stn	City	Location	Valid hrs	P E R C E N T I L E S							Maximum		# of times above	
				10%	30%	50%	70%	90%	99%	Mean	1h	24h	24h	1y
12008	Windsor	467 University Av W	8636	0.0	0.1	0.1	0.2	0.3	0.7	0.15	2.6	0.74	0	0
12016	Windsor	College/South St	8672	0.1	0.1	0.2	0.3	0.5	1.1	0.25	2.7	0.89	0	0
14064	Samia	Centennial Pk, Front St/Cn Tracks	8265	0.0	0.1	0.1	0.2	0.4	0.7	0.18	1.2	0.63	0	0
15025	London	900 Highbury Ave.	8193	0.0	0.1	0.1	0.2	0.3	0.6	0.17	1.2	0.51	0	0
22907	Nanticoke	Rainham Rd (Near Stelco Gate)	8310	0.0	0.1	0.1	0.2	0.4	0.6	0.16	1.6	0.56	0	0
26060	Kitchener	West Ave/Homewood	8633	0.0	0.1	0.1	0.2	0.3	0.6	0.18	2.1	0.57	0	0
27067	St Catharines	Argyle Cres (Pump Stn)	8119	0.0	0.1	0.2	0.2	0.4	0.8	0.20	2.0	0.79	0	0
29000	Hamilton	Elgin/Kelly St	8730	0.1	0.2	0.2	0.4	0.7	1.6	0.33	3.8	1.23	5	0
29025	Hamilton	Barton/Wentworth	7494	0.1	0.2	0.3	0.4	0.6	1.3	0.32	4.7	1.09	2	0
29102	Hamilton	467 Beach Blvd	8180	0.1	0.2	0.3	0.5	0.9	1.7	0.42	4.6	1.27	7	0
29114	Hamilton	Vickers Rd/East 18th St	8324	0.0	0.1	0.2	0.2	0.4	1.0	0.21	3.7	0.77	0	0
29118	Hamilton	Main St W/Hwy403	8636	0.1	0.1	0.2	0.3	0.6	1.3	0.28	2.5	1.04	1	0
29531	Hamilton	Jr Case	8000	0.1	0.2	0.3	0.6	1.2	2.5	0.51	4.8	2.58	29	1
29547	Hamilton	Pier 25	3800	0.0	0.0	0.2	0.5	0.9	1.9	INS	3.4	1.43	5	INS
29561	Hamilton	Hamilton - Homeside	8354	0.0	0.1	0.2	0.3	0.6	1.2	0.28	2.7	0.86	0	0
31303	Toronto	Toronto (Osgoode)	8436	0.1	0.2	0.3	0.4	0.7	1.2	0.35	2.3	0.83	0	0
33003	Scarborough	Lawrence/Kennedy	8389	0.1	0.2	0.2	0.3	0.5	1.1	0.28	1.9	0.81	0	0
34020	North York	Hendon Ave (Yonge/Finch)	8452	0.1	0.1	0.2	0.3	0.6	1.1	0.28	3.0	0.79	0	0
35003	Eiobicoke	Elmcrest Rd (Centennial Pk)	8574	0.1	0.1	0.2	0.3	0.5	1.1	0.26	2.5	0.86	0	0
35033	Eiobicoke	Evans/Arnold Av	8578	0.1	0.2	0.3	0.4	0.7	1.3	0.36	4.2	0.93	0	0
36030	York	Clearview Ht. GS/Keale St	8472	0.1	0.1	0.2	0.3	0.6	1.4	0.29	3.3	0.79	0	0
44008	Burlington	Hwy2/North Shore Blvd E	8534	0.1	0.1	0.2	0.4	0.6	1.1	0.30	2.1	0.92	0	0
44015	Oakville	Bronte Rd/Woburn Cres	8628	0.0	0.1	0.2	0.3	0.4	0.9	0.22	4.3	0.86	0	0
45025	Oshawa	Ps Ritson Rd/Olive Av	8485	0.0	0.1	0.2	0.3	0.5	1.0	0.24	4.9	0.69	0	0
46110	Mississauga	Queensway W/Hurontario St	8299	0.1	0.2	0.3	0.4	0.6	1.3	0.32	2.7	0.94	0	0
51001	Ottawa	Med Gde, Rideau/Wurtenburg St	8590	0.0	0.1	0.1	0.2	0.3	0.7	0.16	1.6	0.52	0	0
52020	Kingston	133 Dalton Ave.	8676	0.0	0.1	0.1	0.2	0.4	0.9	0.16	3.1	0.68	0	0
56051	Cornwall	Memorial Pk Bedford/Third	8760	0.0	0.0	0.1	0.1	0.2	0.6	0.11	1.5	0.74	0	0
62200	Fort Frances	Robert Moore PS	8548	0.0	0.0	0.1	0.1	0.2	0.5	0.09	2.0	0.36	0	0
63200	Thunder Bay	MOT 615 James St S	8250	0.0	0.1	0.1	0.2	0.4	0.9	0.17	1.7	0.67	0	0
71068	Sault Ste Marie	Wm. Merrifield School	8476	0.0	0.1	0.1	0.3	0.5	1.1	0.22	2.8	0.79	0	0
75010	North Bay	Clippewa School	8703	0.0	0.0	0.1	0.2	0.3	0.8	0.15	1.5	0.55	0	0
77203	Sudbury	Science North	8516	0.0	0.0	0.1	0.2	0.3	0.6	0.12	1.6	0.47	0	0

TABLE 7 Total Reduced Sulphur (TRS) Statistics (1997)

Unit: parts per billion (ppb)

Sta #	City	Location	Valid hrs	P E R C E N T I L E S							Maximum		Exceedances of Pulp Mill Criterion 1h
				10%	30%	50%	70%	90%	99%	Mean	1h	24h	
12007	Windsor	Wright/Water St	8615	0	0	0	1	3	10	1.0	31	10.8	3
12016	Windsor	College/South St	7955	0	0	1	1	4	19	1.6	129	28.0	30
14064	Samia	Centennial Pk, Front St/Cn Tracks	8492	0	0	0	0	1	3	0.2	39	3.5	1
18007	Tiverton	Concession Rd 2 Lot A	8674	0	0	0	0	0	1	0.1	2	1.0	0
22904	Nanticoke	Walpole S Ps Sandusk Rd	8456	0	0	0	1	1	4	0.4	14	3.4	0
22907	Nanticoke	Ranham Rd (Near Stelco Gate)	8513	0	0	0	1	2	10	0.8	32	11.7	2
29000	Hamilton	Elgin/Kelly St	7185	0	0	1	1	2	8	1.0	32	7.0	2
29025	Hamilton	Barton/Wentworth	8257	0	1	1	2	6	0.9	33	4.9	1	1
29102	Hamilton	467 Beach Blvd	7771	0	1	2	3	7	17	2.7	52	15.6	21
29114	Hamilton	Vickers Rd/East 18Th St	8661	0	0	0	1	1	5	0.6	20	6.0	0
29118	Hamilton	Main St W/Hwy403	8648	0	0	0	1	2	6	0.8	35	5.0	1
29531	Hamilton	Jt Case	7904	0	0	1	1	5	19	1.9	48	18.0	29
29547	Hamilton	Pier 25	6097	0	0	1	2	6	20	2.3	61	15.7	28
44015	Oakville	Bronte Rd/Wohum Cres	8642	0	1	1	2	2	4	1.3	8	4.5	0
46117	Mississauga	Meadow Pk, Apple Lane Club	8571	0	1	1	1	1	2	0.8	5	2.2	0
56051	Cornwall	Memorial Pk Bedford/Third	8760	0	1	2	2	4	8	2.0	117	9.4	8
56068	Cornwall	School 435 Second St W	8563	0	1	3	6	9	18	4.1	53	17.2	9
61027	Dryden	35 Van Horne Av	8621	0	0	0	0	1	12	0.6	60	16.3	10
62030	Fort Frances	Portage/Church St	8720	0	0	0	1	8	31	2.6	131	25.2	117
62032	Fort Frances	Cemetery, Colonization Rd W	8571	0	0	0	0	2	9	0.6	56	9.3	9
62045	Int'l Falls	US Customs Bldg	8515	0	0	0	1	6	24	1.9	122	21.1	62
62047	Fort Frances	Fifth St/Cornwall Ave	8709	0	0	0	1	7	40	2.5	148	43.1	188
62200	Fort Frances	Robert Moore P's	8735	0	0	0	0	2	15	1.1	135	15.3	44
63033	Marathon	Water Tower	8544	0	0	0	0	0	3	0.2	19	2.3	0
63046	Thunder Bay	Can-Car Montreal St	8713	0	0	0	0	3	17	1.1	107	10.5	27
63084	Red Rock	Recreation Centre	8509	0	0	0	0	4	27	1.6	80	29.8	83
63090	Terrace Bay	St Martin School	8702	0	0	0	0	3	16	1.0	72	8.8	29
63092	Terrace Bay	Terrace Heights Dr	8460	0	0	0	0	2	33	1.6	218	26.3	129
63200	Thunder Bay	MOT 615 James St S	8539	0	0	0	0	0	3	0.1	15	3.1	0
71068	Sault Ste Marie	Wm. Merrifield School	8555	0	0	0	0	1	7	0.3	28	6.9	1
77203	Sudbury	Science North	8548	0	0	0	0	1	1	0.3	2	1.2	0

TABLE 8 Carbon Monoxide (CO) Statistics (1997)

Unit: parts per million (ppm)

Stn	City	Location	Valid hrs	P E R C E N T I L E S							Maximum		# of times above	
				10%	30%	50%	70%	90%	99%	Mean	1h	8h	1h	8h
12008	Windsor	467 University Av W	8642	0	0	1	1	1	2	0.6	8	2.5	0	0
14064	Samia	Centennial Pk, Front St/Cn Tracks	8638	0	0	0	0	1	1	0.2	4	2.2	0	0
15025	London	900 Highbury Ave.	8590	0	0	0	0	1	1	0.3	4	1.6	0	0
26060	Kitchener	West Ave/Homewood	8361	0	0	0	0	1	1	0.2	8	4.4	0	0
27067	St Catharines	Argyle Cres (Pump Stn)	8381	0	0	0	0	0	1	0.1	7	2.1	0	0
29000	Hamilton	Elgin/Kelly St	8613	0	0	1	1	1	2	0.7	6	2.4	0	0
29118	Hamilton	Main St W/Hwy403	8534	0	0	1	1	1	2	0.6	5	2.5	0	0
31303	Toronto	Toronto (Osgoode)	8477	1	1	1	1	2	3	1.2	6	3.6	0	0
33003	Scarborough	Lawrence/Kennedy	8222	0	0	1	1	1	2	0.6	5	3.9	0	0
34020	North York	Hendon Ave (Yonge/Finch)	8567	0	0	1	1	1	2	0.7	5	5.0	0	0
35003	Ethioko	Elmcrest Rd (Centennial Pk)	8372	1	1	1	1	2	2	1.0	5	3.5	0	0
35033	Ethioko	Evans/Arnold Av	8586	1	1	1	1	2	3	1.1	5	3.3	0	0
36030	York	Clearview Hw/Keele St	8490	0	0	0	1	1	3	0.6	10	5.9	0	0
44008	Burlington	Hwy2/North Shore Blvd E	8560	0	0	0	1	1	1	0.4	3	1.8	0	0
44015	Oakville	Bronte Rd/Woburn Cres	8668	0	0	0	0	1	1	0.3	3	1.6	0	0
45025	Oshawa	Ps Risdon Rd/Olive Av	8328	0	0	0	1	1	3	0.4	10	6.1	0	0
51001	Ottawa	Med Gls, Rideau/Wurtenburg St	8453	0	0	0	1	1	2	0.4	9	3.0	0	0
56051	Cornwall	Memorial Pk Bedford/Thurd	8755	1	1	1	1	2	2	1.1	7	3.3	0	0
63200	Thunder Bay	MOT 615 James St S	8635	0	0	0	0	1	2	0.3	4	2.4	0	0
77203	Sudbury	Science North	8455	0	0	0	0	0	1	0.0	5	1.6	0	0



TABLE 9 Nitrogen Dioxide (NO<sub>2</sub>) Statistics (1997)

Unit: parts per billion (ppb)

Stn #	City	Location	Valid hrs	P E R C E N T I L E S										Maximum		# of times above	
				10%	30%	50%	70%	90%	Mean	1h	24h	1h	24h	1h	24h		
12008	Windsor	467 University Av W	8445	11	17	22	29	39	55	23.8	82	46.6	0	0			
14064	Sarnia	Centennial Pk, Front St/Cn Tracks	8409	5	9	14	21	34	50	16.9	76	38.8	0	0			
15013	Parkhill	Puc Bldg	8437	3	6	8	11	18	34	9.5	69	34.0	0	0			
15025	London	900 Highbury Ave.	7946	7	12	16	22	32	50	18.0	76	41.3	0	0			
22086	Nanticoke	Cheapside Rd(3 Km S of Hwy 3)	8696	4	5	7	9	15	27	8.3	42	27.0	0	0			
22901	Long Point	Provincial Park	8241	2	3	4	7	13	26	6.1	49	25.3	0	0			
26060	Kitchener	West Ave/Homewood	8282	5	7	11	17	27	41	13.7	56	41.7	0	0			
27067	St Catharines	Argyle Cres (Pump Stn)	8170	6	9	12	16	25	39	13.8	61	31.7	0	0			
29000	Hamilton	Elgin/Kelly St	8687	7	12	17	23	32	45	18.6	59	41.4	0	0			
29102	Hamilton	467 Beach Blvd	6741	5	12	18	25	34	48	19.1	65	48.3	0	0			
29114	Hamilton	Vickers Rd/East 18Th St	8228	5	8	13	18	31	47	15.4	76	42.8	0	0			
29118	Hamilton	Main St W/Hwy403	8152	7	12	17	24	36	54	19.5	87	54.0	0	0			
31303	Toronto	Toronto (Osgoode)	8410	18	24	30	37	49	69	31.7	108	66.2	0	0			
33003	Scarborough	Lawrence/Kennedy	8361	9	16	22	29	39	56	23.4	81	43.8	0	0			
34020	North York	Hendon Ave (Yonge/Finch)	8459	5	11	19	27	38	55	20.2	81	48.6	0	0			
35003	Etobicoke	Elmcrest Rd (Centennial Pk)	8499	12	18	25	32	45	62	26.7	98	53.9	0	0			
35033	Etobicoke	Evans/Arnold Av	8617	16	22	28	34	45	61	29.2	87	50.1	0	0			
36030	York	Clearview Ht. GS/Keele St	6833	11	16	22	29	39	56	23.9	75	44.0	0	0			
44008	Burlington	Hwy2/North Shore Blvd E	8616	4	8	12	17	25	37	13.2	75	34.6	0	0			
44015	Oakville	Bronte Rd/Woburn Cres	8673	9	14	19	25	36	49	20.8	87	42.5	0	0			
45025	Oshawa	Ps Ritsen Rd/Olive Av	8462	6	10	17	24	34	51	18.6	83	40.5	0	0			
48002	Stouffville	Hwy47E of Hwy48	8498	1	4	6	10	21	35	8.7	55	29.6	0	0			
49010	Dorset	Hwy 117/Paint Lake Rd	8627	1	1	2	3	6	20	3.1	59	22.8	0	0			
51001	Ottawa	McId Gds, Rideau/Wurtemburg St	8615	1	5	10	16	29	43	12.5	66	36.8	0	0			
56051	Corwall	Memorial Pk Bedford/Third	8463	0	2	5	9	20	42	8.0	100	42.7	0	0			
63200	Thunder Bay	MOT 615 James St S	8156	3	6	9	13	26	45	11.7	65	36.5	0	0			
71068	Sault Ste Marie	Wm. Merrifield School	8638	1	4	8	13	23	36	10.3	53	29.3	0	0			
77203	Sudbury	Science North	6855	1	3	5	8	16	39	7.4	56	30.2	0	0			

TABLE 10 Nitrogen Oxide (NO) Statistics (1997)

Unit: parts per billion (ppb)

Stn #	City	Location	Valid hrs	P E R C E N T I L E S										Maximum	
				10%	30%	50%	70%	90%	99%	Mean	1h	24h			
12008	Windsor	467 University Av W	8445	3	6	9	14	36	111	15.9	286	114.7			
14064	Sarnia	Centennial Pk, Front St/Cn Tracks	8403	0	2	3	6	16	60	7.0	220	67.6			
15013	Parkhill	Puc Bldg	8447	1	1	2	2	4	15	2.3	59	14.5			
15025	London	900 Highbury Ave.	7971	0	2	4	7	17	65	7.6	248	73.1			
22086	Nanticoke	Cheapside Rd(3 Km S of Hwy 3)	8696	0	1	1	2	4	13	1.7	49	9.3			
22901	Long Point	Provincial Park	8243	0	0	0	1	2	10	0.9	70	12.0			
26060	Kitchener	West Ave/Homewood	8282	1	1	2	4	11	54	5.5	389	50.7			
27067	St Catharines	Argyle Cres (Pump Stn)	8175	1	2	4	7	22	121	10.3	371	100.3			
29000	Hamilton	Elgin/Kelly St	8687	1	2	5	9	25	98	10.8	405	67.1			
29102	Hamilton	467 Beach Blvd	6742	1	5	13	24	49	125	20.5	304	71.0			
29114	Hamilton	Vickers Rd/East 18Th St	8229	0	1	3	5	15	60	6.3	161	47.1			
29118	Hamilton	Main St W/Hwy403	8152	1	3	7	16	58	209	22.1	415	124.4			
31190	Toronto	CN Tower, 301 Front St W	3433	0	1	1	2	7	31	3.2	272	26.0			
31303	Toronto	Toronto (Osgoode)	8411	6	15	24	38	70	154	32.9	355	120.8			
33003	Scarborough	Lawrence/Kennedy	8360	3	7	15	26	56	166	24.9	488	172.4			
34020	North York	Hendon Ave (Yonge/Finch)	8459	3	4	7	15	39	120	16.3	323	96.5			
35003	Ethiobioke	Elmcrest Rd (Centennial Pk)	8499	1	3	6	14	48	170	18.6	521	99.5			
35033	Ethiobioke	Evans/Arnold Av	8617	5	12	21	34	77	218	33.8	515	126.1			
36030	York	Clearview Ht. GS/Keele St	6833	2	5	9	17	51	217	21.9	584	136.6			
44008	Burlington	Hwy2/North Shore Blvd E	8616	1	2	5	10	30	111	12.2	309	93.2			
44015	Oakville	Bronte Rd/Woburn Cres	8673	4	6	8	12	32	119	14.9	300	66.3			
45025	Oshawa	Ps Riteon Rd/Olive Av	8462	4	6	9	15	36	123	16.4	292	86.0			
48002	Stouffville	Hwy47/E of Hwy48	8498	2	2	3	5	11	45	5.9	205	41.1			
49010	Dorset	Hwy 117/Paint Lake Rd	8627	1	1	1	1	2	5	1.3	27	6.5			
51001	Ottawa	Med Gds, Rideau/Wurtemburg St	8615	0	0	1	3	14	70	5.5	362	51.6			
56051	Corwall	PM10 Memorial Pk Bedford/Third	8465	0	0	2	4	12	69	6.1	298	75.5			
63200	Thunder Bay	MOT 615 James St S	8156	2	3	4	7	19	83	8.9	318	92.0			
71068	Sault Ste Marie	Wm. Merrifield School	8638	0	1	2	5	15	64	6.1	184	34.8			
77203	Sudbury	Science North	6855	1	2	3	4	8	54	4.9	170	44.5			

**TABLE 11 Nitrogen Oxides (NOx) Statistics (1997)**

Unit: parts per billion (ppb)

Sta #	City	Location	Valid hrs	P E R C E N T I L E S							Maximum	
				10%	30%	50%	70%	90%	99%	Mean	1h	24h
12008	Windsor	467 University Av W	8501	16	23	31	43	71	160	39.3	354	159.8
14064	Samia	Centennial Pk. Front St/Cn Tracks	8405	9	13	19	28	49	101	24.9	266	104.7
15013	Parkhill	Puc Bldg	8445	4	5	7	10	19	40	9.6	124	41.5
15025	London	900 Highbury Ave.	7946	9	14	19	27	46	100	24.4	322	113.1
22086	Nanticoke	Cheapside Rd(3 Km S of Hwy 3)	8696	4	6	8	11	18	36	9.7	78	35.5
22901	Long Point	Provincial Park	8241	2	3	5	7	15	34	6.9	101	37.2
26060	Kitchener	West Ave/Homeswood	8282	6	9	14	21	37	88	19.2	432	80.9
27067	St Catharines	Argyle Cres (Pump Stn)	8170	9	13	17	24	46	147	24.5	409	118.2
29000	Hamilton	Elgin/Kelly St	8687	9	15	22	33	55	137	29.5	448	106.7
29102	Hamilton	467 Beach Blvd	6742	7	19	33	49	77	156	39.5	352	107.8
29114	Hamilton	Vickers Rd/East 18Th St	8228	7	11	15	23	45	98	21.9	213	85.7
29118	Hamilton	Main St W/Hwy403	8152	10	16	25	42	93	247	42.1	461	157.6
31303	Toronto	Toronto (Osgoode)	8388	26	41	55	75	113	206	64.3	424	178.4
33003	Scarborough	Lawrence/Kennedy	8360	13	25	37	53	92	207	47.5	535	202.5
34020	North York	Hendon Ave (Yonge/Finch)	8459	8	16	28	44	75	160	36.7	384	132.8
35003	Etobicoke	Elmcrest Rd (Centennial Pk)	8499	14	22	32	48	89	211	45.2	597	137.8
35033	Etobicoke	Evans/Arnold Av	8617	22	35	49	67	116	265	62.1	600	154.7
36030	York	Clearview Ht. GS/Keele St	6833	15	23	32	47	88	256	45.9	658	170.9
44008	Burlington	Hwy2/North Shore Blvd E	8616	5	11	17	28	54	136	25.6	340	112.4
44015	Oakville	Bronte Rd/Wohrn Cres	8673	12	17	24	35	63	156	32.8	348	101.1
45025	Oshawa	Ps Ritson Rd/Olive Av	8462	10	17	27	40	68	161	34.9	330	111.7
48002	Stouffville	Hwy47/E of Hwy48	8498	4	7	10	16	31	74	14.6	238	68.3
49010	Dorset	Hwy 117/Paint Lake Rd	8646	2	2	3	4	8	23	4.3	71	29.0
51001	Ottawa	Mcd Gds, Rideau/Wurtenburg St	8615	1	6	11	20	42	106	18.0	409	83.8
56051	Cornwall	Memorial Pk Bedford/Thurd	8465	0	4	7	14	32	102	14.2	396	118.2
63200	Thunder Bay	MTO 615 James St S	8156	5	9	14	21	43	127	20.9	374	122.3
71068	Sault Ste Marie	Wm. Merrifield School	8731	2	5	11	19	39	95	16.7	220	60.3
77203	Sudbury	Science North	6855	4	6	8	12	22	91	12.5	215	74.2



TABLE 12 Ozone (O<sub>3</sub>) Statistics (1997)

Unit: parts per billion (ppb)

Stn #	City	Location	Valid hrs	P E C E N T I L E											Arith.		Maximum		# of times above Criterion
				10	30	50	70	90	99	Mean	1h	24h							
12008	Windsor	467 University Av W	8609	2	8	17	28	44	74	20.7	107	64.1	56						
12016	Windsor	College/South St	8576	1	6	14	24	40	69	17.9	105	60.4	30						
13021	Merlin	MOE Water Pump Stn Middle Rd	8699	6	17	26	34	49	77	27.0	107	77.0	67						
14064	Sarnia	Centennial Pk, Front St/Cn Tracks	8536	4	15	24	32	44	70	24.5	105	64.5	15						
14118	Mandamin	Concession Rd 26	8353	8	19	27	35	47	75	27.9	107	69.5	57						
15009	Longwoods	Longwoods Conservation	8567	5	16	25	33	47	72	25.9	97	58.9	38						
15013	Parkhill	Puc Bldg	8557	8	19	28	35	49	77	28.3	112	76.3	55						
15020	Grand Bend	Water Treatment Plant	8565	11	23	31	38	50	80	31.2	146	70.7	78						
15025	London	900 Highbury Ave.	8524	4	13	21	29	45	74	22.8	97	76.8	48						
18007	Tiverton	Concession Rd 2 Lot A	8663	15	26	32	38	48	77	32.5	146	80.0	63						
22071	Simcoe	Experimental Farm	8331	9	19	27	35	50	79	28.6	106	82.3	62						
22901	Long Point	Provincial Park	6830	16	27	32	40	58	94	35.2	119	86.8	171						
26060	Kitchener	West Ave/Homeswood	8571	2	14	22	31	44	68	23.4	88	73.7	20						
27067	St Catharines	Argyle Cres (Pump Stn)	8287	1	11	19	27	42	68	20.9	92	65.4	16						
29000	Hamilton	Elgin/Kelly St	8706	1	8	15	24	38	66	18.1	88	72.1	15						
29114	Hamilton	Vickers Rd/East 18Th St	8683	2	12	21	29	43	73	22.2	100	80.0	30						
29118	Hamilton	Main St W/Hwy403	8448	1	8	16	25	38	68	18.6	87	74.5	17						
31190	Toronto	CN Tower, 301 Front St W	8558	17	28	35	44	61	89	37.3	119	91.5	188						
31303	Toronto	Toronto (Osgoode)	8150	2	6	11	18	28	50	13.7	86	49.1	3						
33003	Scarborough	Lawrence/Kennedy	8081	1	7	15	24	39	69	18.0	102	55.1	31						
34020	North York	Hendon Ave (Yonge/Finch)	8422	3	11	20	29	42	68	21.6	95	65.2	26						
35003	Etobicoke	Elmcrest Rd (Centennial Pk)	8345	3	8	16	26	40	68	19.4	96	65.3	29						
35033	Etobicoke	Evans/Arnold Av	8528	2	6	14	22	37	70	17.2	105	59.0	39						
36030	York	Clearview Hl. GS/Keele St	8296	2	7	16	25	39	67	18.4	103	56.4	33						
44008	Burlington	Hwy2/North Shore Blvd E	8575	3	11	20	28	43	68	21.7	92	66.9	14						
44015	Oakville	Bronte Rd/Woburn Cres	8695	2	9	19	28	42	69	20.8	101	71.9	26						
45025	Oshawa	P's Risdon Rd/Oliver Av	8547	4	14	22	30	41	68	23.2	97	59.8	38						
46110	Mississauga	Queensway W/Huronario St	8366	2	9	18	27	40	69	20.0	100	68.6	28						
48002	Stouffville	Hwy47/E of Hwy48	8632	10	22	30	37	49	76	30.1	108	74.2	54						
49010	Dorset	Hwy 117/Pant Lake Rd	8662	13	24	31	37	47	68	30.9	108	57.8	23						
51001	Ottawa	Med Gds, Rideau/Wurtenburg St	8653	2	12	20	27	39	60	20.5	90	70.5	5						
52020	Kingston	133 Dalton Ave.	8739	1	10	19	27	39	69	20.1	100	67.8	29						
56051	Cornwall	Memorial Pk Bedford/Third	8755	3	14	22	30	41	67	22.8	96	66.2	14						

**TABLE 12 Ozone (O<sub>3</sub>) Statistics (1997)**  
**Unit: parts per billion (ppb)**

Stn #	City	Location	Valid hrs	P E C E N T I L E							Arith.		Maximum		# of times above Criterion
				10	30	50	70	90	99	Mean	1h	24h	1h		
59006	Peterborough	City Hall, 500 George St	4064	13	25	31	36	44	62	INS	85	55.0	2		
62200	Fort Frances	Robert Moore PS	8157	14	23	30	35	44	57	29.0	77	53.2	0		
63200	Thunder Bay	MOT 615 James St S	8572	4	16	25	32	40	57	23.9	75	58.3	0		
71068	Sault Ste Marie	Wm. Merrifield School	8502	6	17	25	32	42	62	24.9	83	62.0	3		
75010	North Bay	Chippewa St	8675	6	19	27	34	45	66	26.6	100	67.6	30		
77203	Sudbury	Science North	8678	12	21	27	33	44	69	28.0	103	77.1	33		

**TABLE 13 Innaadable Particles (PM10) Statistics (1997)**

Unit= micrograms/m<sup>3</sup>

Stn	City	Location	Valid Hrs	10	30	50	70	90	99	Mean	1 h	24 h	Above Criteria
12016	Windsor	College/South St	8655	10	16	22	30	50	128	27.7	336	127.3	35
14064	Sania	Centennial Pk, Front St/Ch Tracks	8557	6	10	14	21	36	66	18.1	219	61.8	6
15025	London	London - AQL	8308	7	11	15	21	35	60	18.4	126	68.0	4
29000	Hamilton	Elgin/Kelly St	8620	7	11	16	22	35	74	19.4	207	70.6	7
29531	Hamilton	Jr Case	8164	8	18	28	43	80	217	39.4	801	133.0	92
29561	Hamilton	Hamilton - Homeside	7637	7	12	17	23	37	64	20.0	129	49.6	0
33003	Scarborough	Lawrence/Kennedy	8289	7	12	16	22	34	58	19.0	138	58.3	1
35003	Etoicoke	Elmerest Rd (Centennial Pk)	3706	5	10	14	19	32	57	16.5	84	54.4	1
35033	Etoicoke	Evans/Arnold Av	7303	6	12	16	22	34	64	18.5	101	55.4	2
48002	Stouffville	Hwy47/E of Hwy48	3828	5	9	12	18	28	52	15.2	148	52.2	1
52020	Kingston	Churchill Pk, Napier St	7672	2	7	13	22	45	115	20.4	486	102.3	15
71068	Sault Ste Marie	Wm. Merrifield School	8722	4	7	11	17	36	90	16.8	359	106.5	8

Note: measurements made by TEOM sampler

**TABLE 14 Respirable Particles (PM2.5) Statistics (1997)**

Unit= micrograms/m<sup>3</sup>

Stn	City	Location	Valid Hrs	PERCENTILES										Arith		Maximum	
				10	30	50	70	90	99	Mean	1 h	24 h					
18007	Tiverton	Concession Rd 2 Lot A	2854	5	7	8	11	17	38	INS	60	37.8	INS	60	34.8	INS	60
22071	Simcoe	Experimental Farm	2722	4	6	9	12	20	44	INS	60	34.8					
26060	Kitchener	West Ave/Homewood	2000	7	10	13	17	21	31	INS	47	26.8	INS	46	20.6	INS	49
27067	St Catharines	Argyle Cres (Pump Stn)	1575	4	7	10	12	17	26	INS	46	20.6					
29114	Hamilton	Vickers Rd/East 18th St	1998	4	7	10	14	20	33	INS	49	30.5	INS	64	43.7	INS	60
31303	Toronto	Toronto (Osgoode)	4966	5	9	12	17	29	50	INS	64	43.7					
34020	North York	Hendon Ave (Yonge/Finch)	4011	4	7	10	14	22	42	INS	60	37.5	INS	72	43.6	INS	60
35033	Etobicoke	Evans/Arnold Av	8410	5	8	11	15	24	43	13.0	72	43.6					
45025	Oshawa	Ps Ritson Rd/Olive Av	6071	4	7	10	14	25	46	12.5	71	50.5	INS	76	38.9	INS	45
46110	Mississauga	Queensway W/Huronario St	8310	4	6	8	12	20	38	10.7	76	38.9					
51001	Ottawa	McD Gds, Rideau/Wurtemberg St	965	4	6	9	12	18	32	INS	45	25.5	INS	45	25.5	INS	45

Note: measurements made by TEOM sampler



TABLE 15 Total Suspended Particulate (TSP) Statistics (1997)

Unit= micrograms/cubic metre  
TSP 24-hour AAQC is 120 micrograms/m<sup>3</sup>  
TSP 1-year AAQC is 60 micrograms/m<sup>3</sup>

Stn	City	Location	Number of Samples	P E R C E N T I L E S							Arith Mean	Geom Mean	Above 24h	# of Times Criterion Exceeded
				10%	30%	50%	70%	90%	99%	Max.				
11001	St Marys	309 Thomas St	54	25.0	35.8	47.0	63.6	93.7	144.5	154.0	54.5	47.2	2	0
12007	Windsor	Wright/Water St	57	34.4	51.0	70.0	79.0	100.4	129.2	141.0	67.6	61.3	1	1
12008	Windsor	467 University Av W	59	34.8	44.4	58.0	68.6	83.8	123.0	145.0	59.6	56.1	1	0
12011	Windsor	Drouillard Rd/Richmond St	47	35.6	56.6	72.0	83.0	100.4	146.0	157.0	71.1	64.9	2	1
12013	Windsor	Filtrat Pl 3665 Wyandotte St E	52	41.0	52.0	69.5	96.7	144.0	189.2	203.0	80.9	71.7	10	1
12015	Windsor	Sewage Sln Hwy 18/Prospect	53	45.6	67.6	88.0	104.6	141.2	239.2	286.0	93.9	84.2	10	1
12016	Windsor	College/South St	56	35.5	52.5	67.0	79.5	126.0	231.7	263.0	77.5	66.8	6	1
12038	Windsor	2885 Howard Av	56	53.5	75.0	91.5	117.5	180.0	337.9	433.0	108.2	94.9	16	1
12053	Amherstburg	415 Front St	54	26.3	36.9	48.0	67.0	93.1	138.0	155.0	55.1	48.6	2	0
12055	Amherstburg	Duff St (E End)	47	29.6	40.6	54.0	70.0	88.6	97.3	101.0	55.9	51.7	0	0
12058	Windsor	Columbus Centre	56	30.0	46.5	58.0	71.5	100.5	165.8	181.0	76.2	59.1	4	0
12060	Windsor	2335 Dougall Ave	39	29.4	42.4	51.0	58.8	77.4	120.8	133.0	76.2	59.1	1	INS
12061	Amherstburg	1.4 km NW Allied Chem	55	41.8	54.2	73.0	87.4	133.2	179.8	210.0	76.0	68.6	7	1
14016	Courtright	Hwy40 (OPP Lambton GS)	59	21.0	29.8	40.0	49.8	66.0	106.8	123.0	42.5	38.0	1	0
14030	Coruna	Rt1 (W of House)	53	18.2	23.6	29.0	43.4	81.4	98.4	102.0	39.3	33.6	0	0
14151	Samia	David/Front St	49	24.8	33.0	48.0	59.8	75.2	98.6	101.0	48.7	43.8	0	0
15025	London	900 Highbury Ave.	55	23.8	32.2	44.0	54.0	70.8	96.8	106.0	46.2	42.2	0	0
17014	Beachville	Cyanamide Rd (Gordon Prop)	52	26.0	41.3	46.5	62.0	72.9	100.9	107.0	50.3	46.3	0	0
17015	Beachville	26 Vine St (MOE Trailer)	51	33.0	42.0	52.0	66.0	90.0	127.5	128.0	57.4	51.9	2	0
17020	Ingersoll	Hwy 2 Rt 2 (J Spritel Prop)	50	42.6	51.4	71.5	83.1	125.2	168.1	172.0	75.8	67.3	7	1
17021	Embro	Oxford City Rd 6 (Hesslon Farm)	35	31.4	51.0	73.0	111.8	135.6	188.0	188.0	INS	INS	7	INS
17215	Beachville	26 Vine St (MOE Trailer)	46	48.0	71.0	86.5	99.5	120.0	157.2	159.0	85.1	77.6	5	1
17315	Beachville	26 Vine St (MOE Trailer)	50	23.9	30.7	41.5	53.6	69.2	86.6	89.0	44.2	41.0	0	0
22092	Nanticoke	Rainham Rd/Sandusk Rd	59	18.8	29.0	37.0	48.6	64.6	113.6	142.0	42.0	37.2	1	0
22904	Nanticoke	Walpole S Ps Sandusk Rd	55	24.0	30.2	37.0	48.8	72.4	98.6	118.0	43.1	39.1	0	0
22907	Nanticoke	Rainham Rd (Near Stelco Gate)	50	34.3	43.4	52.0	69.3	99.2	137.1	142.0	59.8	53.9	3	0
22964	Nanticoke	N 2 Km Nanticoke GS	36	21.0	29.5	39.0	51.0	76.5	127.5	146.0	INS	INS	1	INS
26044	Kitchener	134 Lancaster St	43	31.2	38.6	47.0	58.0	88.2	124.9	135.0	54.3	49.7	1	0
26046	Kitchener	778 Guelph St	43	27.0	34.0	41.0	56.2	70.8	108.7	120.0	47.1	42.4	0	0
27045	Welland	337 Alberta/Devon St	60	28.9	37.0	46.0	56.3	72.4	90.0	90.0	49.0	45.9	0	0
27052	Thorold	185 Queen St S	54	40.5	61.9	79.0	108.3	159.0	220.9	241.0	91.8	80.8	11	1
27055	Niagara Falls	Sip Grounds, Stanley Av, Niagara	50	39.0	50.0	59.0	68.3	96.6	109.5	111.0	62.9	59.5	0	0
29000	Hamilton	Elgin/Kelly St	57	33.6	47.0	63.0	71.0	111.2	159.3	161.0	66.8	60.3	5	1
29009	Hamilton	Kenilworth	56	34.0	41.0	50.5	61.0	80.0	99.9	101.0	54.5	51.6	0	0
29011	Hamilton	Burlington/Leeds	57	48.6	65.8	79.0	92.2	128.0	176.1	180.0	84.9	79.4	7	1
29012	Hamilton	Burlington/Wellington	53	34.8	50.4	60.0	75.8	92.6	122.4	125.0	63.8	58.9	1	0
29025	Hamilton	Barton/Wentworth	58	36.4	49.1	62.5	76.0	115.3	155.2	166.0	68.7	63.0	4	1
29102	Hamilton	467 Beach Blvd	57	39.6	58.0	79.0	95.0	128.4	174.0	174.0	81.1	73.6	7	1

TABLE 15 Total Suspended Particulate (TSP) Statistics (1997)

Unit= micrograms/cubic metre

TSP 24-hour AAQC is 120 micrograms/m<sup>3</sup>TSP 1-year AAQC is 60 micrograms/m<sup>3</sup>

Stn	City	Location	Number of Samples	P E R C E N T I L E S							Arith		Geom		# of Times Above Criterion	
				10%	30%	50%	70%	90%	99%	Max.	Mean	Max.	Mean	24h	ly	ly
29111	Greensville	ofield Rd/Hwy 5	49	35.6	57.8	74.0	99.8	163.8	280.0	291.0	90.3	291.0	74.7	9	1	1
29113	Hamilton	Gertrude/Depew	54	49.5	63.7	75.0	100.2	153.6	223.8	227.0	90.6	227.0	81.7	10	1	1
29114	Hamilton	Vickers Rd/East 18Th St	52	26.2	35.3	44.0	58.0	90.4	106.4	111.0	51.0	111.0	46.5	0	0	0
29118	Hamilton	Main St W/Hwy403	54	24.6	32.9	41.0	54.2	76.0	126.6	178.0	47.3	178.0	42.3	1	0	0
29119	Hamilton	Morley St/Parkdale Av	54	43.3	62.9	77.0	90.4	110.0	133.2	138.0	77.8	138.0	73.1	4	1	1
29122	Hamilton	Dundurn/York	52	24.2	33.0	42.0	51.0	58.8	70.0	72.0	41.8	72.0	39.4	0	0	0
29143	Hamilton	Keefer Court (MOE Air Shop)	59	49.4	59.4	74.0	91.6	120.0	147.4	152.0	81.5	152.0	76.7	5	1	1
31045	Toronto	Bruce Ps 51 Larchmount Av	36	31.0	43.5	51.0	56.5	66.0	114.8	133.0	INS	133.0	INS	1	INS	INS
31058	Toronto	Mosley/Leslie Sts	122	36.1	44.0	56.0	68.4	91.8	123.1	149.0	60.1	149.0	55.8	2	0	0
31065	Toronto	633 Eastern Av	162	20.0	38.0	51.5	65.4	96.4	167.6	247.0	56.0	247.0	46.7	8	0	0
31082	Toronto	Works Dept, 138 Hamilton Av	169	34.8	48.4	57.0	69.2	101.2	150.6	167.0	63.0	167.0	57.8	7	0	0
46047	Mississauga	Mississauga Rd S/Port St	50	49.0	61.0	72.5	92.3	112.6	155.2	167.0	78.6	167.0	73.9	4	1	1
46117	Mississauga	Meadow Pk, Apple Lane Club	55	19.4	32.0	36.0	51.8	79.2	121.7	126.0	46.0	126.0	39.9	1	0	0
63046	Thunder Bay	Bombardier Montreal St	59	19.6	33.0	45.0	61.0	95.8	127.5	142.0	50.5	142.0	42.7	1	0	0
71042	Sault Ste Marie	Pumphouse, Bonney St	55	37.4	63.2	81.0	140.2	191.6	388.1	394.0	113.8	394.0	90.1	21	1	1
72083	Hearst	Front/Quinton St	35	36.4	61.6	93.0	148.4	241.0	484.2	525.0	INS	525.0	INS	12	INS	INS

TABLE 16 Lead (Pb) in TSP Statistics (1997)

Unit = micrograms/m<sup>3</sup>Pb 24-hour AAQC is 2.0 micrograms/m<sup>3</sup>

Stn	City	Location	Number of Samples	P E R C E N T I L E S						Arith		Geom		# of times Above Criterion 24 h
				10%	30%	50%	70%	90%	99%	Max	Mean	Mean	Mean	
12007	Windsor	Wright/Water St	57	0.005	0.005	0.005	0.020	0.034	0.050	0.050	0.015	0.010	0.010	0
12008	Windsor	467 University Av W	59	0.005	0.005	0.005	0.020	0.030	0.048	0.060	0.013	0.009	0	0
12011	Windsor	Drouillard Rd/Richmond St	47	0.005	0.005	0.005	0.020	0.034	0.051	0.060	0.014	0.010	0	0
12013	Windsor	Filtrat Pkt 3665 Wyandotte St E	52	0.005	0.005	0.013	0.020	0.040	0.080	0.090	0.019	0.012	0	0
12015	Windsor	Sewage Stn Hwy 18/Prospect	56	0.005	0.005	0.005	0.020	0.040	0.094	0.110	0.019	0.012	0	0
12016	Windsor	College/South St	56	0.005	0.005	0.005	0.020	0.040	0.101	0.150	0.019	0.012	0	0
12038	Windsor	2885 Howard Av	56	0.005	0.005	0.020	0.045	0.105	0.627	0.770	0.062	0.023	0	0
12058	Windsor	Columbus Centre	56	0.005	0.005	0.020	0.020	0.030	0.060	0.060	0.019	0.014	0	0
12060	Windsor	2335 Dougall Ave	38	0.005	0.005	0.005	0.020	0.033	0.303	0.440	INS	INS	0	0
12061	Anheerburg	1.4 km NW Allied Chem	55	0.005	0.005	0.005	0.020	0.046	1.230	1.500	0.065	0.013	0	0
14016	Courtright	Hwy40 (Opp Lambton GS)	59	0.005	0.005	0.005	0.005	0.020	0.030	0.030	0.008	0.007	0	0
14030	Corunna	Rr1 (W of House)	53	0.005	0.005	0.005	0.005	0.020	0.040	0.040	0.009	0.007	0	0
15025	London	900 Highbury Ave.	59	0.005	0.005	0.005	0.005	0.020	0.020	0.020	0.008	0.007	0	0
27052	Thorold	185 Queen St S	54	0.005	0.005	0.005	0.020	0.037	0.040	0.040	0.014	0.010	0	0
29011	Hamilton	Burlington/Leeds	57	0.005	0.020	0.030	0.030	0.050	0.134	0.140	0.031	0.022	0	0
29025	Hamilton	Barton/Wentworth	58	0.005	0.005	0.020	0.020	0.050	0.079	0.090	0.021	0.013	0	0
29102	Hamilton	467 Beach Blvd	58	0.005	0.005	0.005	0.029	0.043	0.070	0.070	0.019	0.012	0	0
29114	Hamilton	Vickers Rd/East 18Th St	53	0.005	0.005	0.005	0.020	0.040	0.064	0.080	0.015	0.010	0	0
31045	Toronto	Bruce Ps 51 Larchmont Av	36	0.005	0.005	0.005	0.020	0.030	0.092	0.110	INS	INS	0	0
31058	Toronto	Mosley/Leslie Sts	122	0.020	0.040	0.070	0.140	0.319	1.582	2.200	0.154	0.082	1	2
31065	Toronto	633 Eastern Av	162	0.005	0.005	0.030	0.060	0.230	2.163	6.300	0.144	0.031	0	0
31082	Toronto	Works Dept. 138 Hamilton Av	169	0.005	0.005	0.005	0.020	0.040	0.100	0.140	0.016	0.009	0	0
46047	Mississauga	Mississauga Rd S/Port St	50	0.384	0.742	1.350	2.030	6.020	8.873	10.000	2.113	1.285	15	15
46117	Mississauga	Meadow Pk, Apple Lane Club	56	0.005	0.005	0.005	0.005	0.020	0.035	0.040	0.009	0.007	0	0
71042	Sault Ste Marie	Pumphouse, Bonney St	55	0.005	0.005	0.005	0.005	0.026	0.525	1.000	0.029	0.007	0	0



TABLE 17 Iron (Fe) in TSP Statistics (1997)

Unit: micrograms/m<sup>3</sup>

Sta	City	Location	Number of Samples	P E R C E N T I L E S							Arith.		Geom. Mean
				10%	30%	50%	70%	90%	99%	Max	Mean	Mean	
12007	Windsor	Wright/Water St	57	0.60	0.98	1.60	1.90	2.86	5.22	5.50	1.67	1.38	
12008	Windsor	467 University Av W	59	0.40	0.60	0.80	0.96	1.50	2.51	2.80	0.90	0.79	
12011	Windsor	Drouillard Rd/Richmond St	47	0.58	0.90	1.30	1.90	2.68	3.41	3.50	1.47	1.21	
12013	Windsor	Filtrat Plt 3665 Wyandotte St E	52	0.50	0.90	1.35	2.21	5.64	10.09	13.00	2.35	1.47	
12015	Windsor	Sewage Stn Hwy 18/Prospect	56	0.75	1.10	1.40	1.90	3.15	7.42	10.00	1.82	1.46	
12016	Windsor	College/South St	56	0.45	0.75	1.30	1.70	2.20	4.66	5.70	1.39	1.12	
12038	Windsor	2885 Howard Av	56	1.85	3.70	6.25	9.85	20.00	42.25	45.00	9.01	5.85	
12058	Windsor	Columbus Centre	56	0.50	0.70	1.05	1.45	2.05	5.00	7.20	1.26	1.02	
12060	Windsor	2335 Dougall Ave	38	0.50	0.70	0.80	1.29	1.76	3.46	3.90	INS	INS	
12061	Amherstburg	1.4 km NW Allied Chem	55	0.64	0.90	1.30	1.58	2.88	4.17	4.60	1.48	1.25	
14016	Courtright	Hwy40 (OPP Lambton GS)	59	0.05	0.20	0.20	0.30	0.50	0.84	0.90	0.28	0.22	
14030	Coruna	Rt1 (W of House)	53	0.05	0.05	0.20	0.30	0.78	1.00	1.00	0.29	0.17	
15025	London	900 Highbury Ave.	59	0.05	0.20	0.30	0.40	0.52	0.90	0.90	0.32	0.25	
27052	Thorold	185 Queen St S	54	0.40	0.70	1.10	1.50	2.87	4.44	4.60	1.42	1.08	
29011	Hamilton	Hurlington/Leeds	57	1.60	2.08	2.70	3.70	6.28	11.44	12.00	3.48	2.96	
29025	Hamilton	Barton/Wentworth	58	0.57	0.80	1.10	2.00	5.26	10.37	11.00	2.09	1.40	
29102	Hamilton	467 Beach Blvd	58	0.50	1.20	2.30	3.58	4.83	8.06	10.00	2.62	1.90	
29114	Hamilton	Vickers Rd/East 18th St	53	0.20	0.30	0.40	0.60	1.92	4.82	5.60	0.84	0.48	
31058	Toronto	Mosley/Leslie Sts	122	0.30	0.50	0.60	0.90	1.50	2.20	2.40	0.77	0.64	
46047	Mississauga	Mississauga Rd S/Port St	28	0.47	0.70	0.90	1.38	1.79	2.71	2.90	INS	INS	
46117	Mississauga	Meadow Pk, Apple Lane Club	56	0.05	0.20	0.30	0.40	0.75	1.20	1.20	0.36	0.26	
71042	South Ste Marie	Pumphouse, Bonney St	55	1.08	1.92	3.70	6.04	13.20	42.56	62.00	6.48	3.67	

TABLE 18 Manganese (Mn) in TSP Statistics (1997)

Unit = micrograms/m<sup>3</sup>  
 Mn 24-hour AAQC is 2.5 micrograms/m<sup>3</sup>

Sta	City	Location	Number of Samples	P E R C E N T I L E S						Geom Mean	Arith Mean	# of times Above Criterion 24 h
				10%	30%	50%	70%	90%	99%			
12007	Windsor	Wright/Water St	57	0.015	0.027	0.042	0.057	0.083	0.110	0.110	0.046	0.038
12008	Windsor	467 University Av W	59	0.014	0.020	0.026	0.033	0.052	0.090	0.100	0.031	0.026
12011	Windsor	Drouillard Rd/Richmond St	47	0.014	0.028	0.044	0.059	0.128	0.175	0.180	0.056	0.041
12013	Windsor	Filtrat Pt 3665 Wyandotte St E	52	0.012	0.030	0.051	0.096	0.278	0.507	0.640	0.104	0.055
12015	Windsor	Sewage Stn Hwy 18/Prospect	56	0.023	0.032	0.043	0.058	0.090	0.205	0.260	0.053	0.043
12016	Windsor	College/South St	56	0.017	0.028	0.042	0.054	0.079	0.134	0.150	0.045	0.037
12038	Windsor	2885 Howard Av	56	0.037	0.062	0.090	0.160	0.250	0.523	0.660	0.130	0.096
12058	Windsor	Columbus Centre	56	0.014	0.017	0.026	0.037	0.058	0.093	0.100	0.031	0.026
12060	Windsor	2335 Dougall Ave	38	0.016	0.020	0.024	0.035	0.062	0.081	0.082	INS	INS
12061	Amherstburg	1.4 km NW Allied Chem	55	0.014	0.025	0.035	0.051	0.086	0.199	0.280	0.046	0.035
14016	Courtright	Hwy40 (OPP Lambton GS)	59	0.002	0.005	0.007	0.009	0.014	0.019	0.022	0.008	0.006
14030	Corunna	Rrl (W of House)	53	0.003	0.004	0.007	0.012	0.019	0.024	0.025	0.009	0.007
15025	London	900 Highbury Ave.	59	0.006	0.008	0.011	0.015	0.024	0.035	0.037	0.013	0.011
27052	Thorold	185 Queen St S	54	0.016	0.029	0.046	0.067	0.120	0.149	0.160	0.056	0.044
29011	Hamilton	Burlington/Leeds	57	0.116	0.140	0.200	0.260	0.444	0.695	0.740	0.242	0.206
29025	Hamilton	Barton/Wentworth	58	0.041	0.069	0.091	0.139	0.436	0.702	0.730	0.165	0.110
29102	Hamilton	467 Beach Blvd	58	0.029	0.062	0.125	0.190	0.263	0.425	0.510	0.143	0.105
29114	Hamilton	Vickers Rd/East 18Th St	53	0.012	0.018	0.024	0.041	0.120	0.230	0.240	0.045	0.028
31058	Toronto	Mosley/Leslie Sts	122	0.014	0.021	0.029	0.036	0.065	0.095	0.110	0.034	0.029
46047	Mississauga	Mississauga Rd S/Port St	28	0.013	0.020	0.030	0.039	0.064	0.075	0.077	INS	INS
46117	Mississauga	Meadow Pk, Apple Lane Club	56	0.006	0.010	0.012	0.018	0.035	0.052	0.053	0.017	0.013
71042	Sault Ste Marie	Pumphouse, Bonney St	55	0.064	0.152	0.240	0.390	0.674	1.192	1.300	0.323	0.219

TABLE 19 Nickel (Ni) in TSP Statistics (1997)

Unit = micrograms/m<sup>3</sup>NI 24-hour AAQC is 2.0 micrograms/m<sup>3</sup>

Stn	City	Location	Number of Samples	P E R C E N T I L E S								Geom Mean	Arith Mean	# of times Above Criterion 24 h
				10%	30%	50%	70%	90%	99%	Max				
12007	Windsor	Wright/Water St	57	0.001	0.003	0.004	0.006	0.008	0.012	0.015		0.004	0.005	0
12008	Windsor	467 University Av W	59	0.001	0.001	0.003	0.005	0.007	0.015	0.017		0.003	0.004	0
12011	Windsor	Drouillard Rd/Richmond St	47	0.001	0.003	0.005	0.006	0.010	0.017	0.018		0.004	0.005	0
12013	Windsor	Filtrat Plt 3665 Wyandotte St E	52	0.002	0.004	0.005	0.007	0.013	0.025	0.030		0.005	0.007	0
12015	Windsor	Sewage Sln Hwy 18/Prospect	56	0.001	0.003	0.005	0.006	0.010	0.016	0.019		0.005	0.005	0
12016	Windsor	College/South St	56	0.001	0.003	0.005	0.007	0.010	0.015	0.016		0.004	0.005	0
12038	Windsor	2885 Howard Av	56	0.003	0.008	0.012	0.019	0.035	0.143	0.200		0.020	0.020	0
12058	Windsor	Columbus Centre	56	0.001	0.001	0.002	0.004	0.008	0.014	0.015		0.003	0.003	0
12060	Windsor	2335 Dougall Ave	38	0.002	0.003	0.005	0.006	0.008	0.013	0.014		INS	INS	0
12061	Anherstburg	1.4 km NW Allied Chem	55	0.001	0.004	0.005	0.006	0.010	0.019	0.019		0.004	0.005	0
14016	Courtright	Hwy40 (QRP Lambton GS)	59	0.001	0.001	0.004	0.007	0.017	0.032	0.035		0.006	0.006	0
14030	Corunna	Rr1 (W of House)	53	0.001	0.001	0.002	0.004	0.006	0.010	0.012		0.003	0.003	0
15025	London	900 Highbury Ave.	59	0.002	0.003	0.004	0.005	0.007	0.009	0.010		0.004	0.004	0
27052	Thorold	185 Queen St S	54	0.001	0.003	0.006	0.008	0.032	0.101	0.120		0.013	0.013	0
29011	Hamilton	Burlington/Leeds	57	0.001	0.006	0.007	0.010	0.013	0.023	0.026		0.006	0.008	0
29025	Hamilton	Barton/Wentworth	58	0.001	0.002	0.004	0.006	0.011	0.020	0.026		0.004	0.005	0
29102	Hamilton	467 Beach Blvd	58	0.001	0.002	0.003	0.007	0.010	0.025	0.031		0.003	0.005	0
29114	Hamilton	Vickers Rd/East 18th St	53	0.001	0.001	0.001	0.002	0.004	0.008	0.009		0.002	0.002	0
31058	Toronto	Mosley/Leslie Sts	122	0.001	0.001	0.002	0.004	0.006	0.013	0.014		0.003	0.003	0
46047	Mississauga	Mississauga Rd S/Port St	28	0.001	0.001	0.002	0.006	0.012	0.016	0.017		INS	INS	0
46117	Mississauga	Meadow Pk, Apple Lane Club	56	0.001	0.001	0.002	0.004	0.006	0.008	0.009		0.003	0.003	0
71042	Sault Ste Marie	Pumphouse, Bonney St	55	0.001	0.001	0.004	0.006	0.016	0.030	0.033		0.006	0.006	0

TABLE 20 Chromium (Cr) in TSP Statistics (1997)

Units = micrograms/m<sup>3</sup>Cr 24-hour AAQC is 1.5 microgram/m<sup>3</sup>

Stn	City	Location	Number of Samples	P E R C E N T I L E S							Arith.		Geom		Above Criterion 24 h
				10%	30%	50%	70%	90%	99%	Max	Mean	Mean	Mean	Mean	
12007	Windsor	Wright/Water St	57	0.003	0.007	0.009	0.012	0.015	0.023	0.025	0.010	0.008	0.008	0.008	0
12008	Windsor	467 University Av W	59	0.001	0.003	0.005	0.008	0.011	0.012	0.012	0.006	0.004	0.004	0.004	0
12011	Windsor	Drouillard Rd/Richmond St	47	0.004	0.005	0.009	0.014	0.019	0.028	0.029	0.010	0.008	0.008	0.008	0
12013	Windsor	Filtrat Pkt 3665 Wyandotte St E	52	0.004	0.007	0.010	0.018	0.034	0.066	0.090	0.016	0.011	0.011	0.011	0
12015	Windsor	Sewage Stn Hwy 18/Prospect	56	0.006	0.008	0.010	0.013	0.019	0.049	0.050	0.012	0.010	0.010	0.010	0
12016	Windsor	College/South St	56	0.003	0.006	0.009	0.011	0.022	0.034	0.035	0.010	0.008	0.008	0.008	0
12038	Windsor	2885 Howard Av	56	0.009	0.020	0.034	0.050	0.094	0.233	0.260	0.047	0.029	0.029	0.029	0
12058	Windsor	Columbus Centre	56	0.003	0.006	0.009	0.012	0.018	0.032	0.041	0.010	0.007	0.007	0.007	0
12060	Windsor	2335 Dougall Ave	38	0.004	0.005	0.007	0.008	0.013	0.018	0.018	0.018	INS	INS	INS	0
12061	Amherstburg	1.4 km NW Allied Chem	55	0.006	0.008	0.010	0.014	0.019	0.038	0.050	0.012	0.010	0.010	0.010	0
14016	Courtright	Hwy40 (OPP Lambton GS)	59	0.001	0.002	0.004	0.006	0.008	0.010	0.011	0.005	0.004	0.004	0.004	0
14030	Corunna	Rt1 (W of House)	53	0.001	0.001	0.003	0.005	0.008	0.010	0.010	0.004	0.003	0.003	0.003	0
15025	London	900 Highbury Ave.	59	0.001	0.001	0.003	0.005	0.008	0.013	0.014	0.004	0.003	0.003	0.003	0
27052	Thorold	185 Queen St S	54	0.035	0.135	0.220	0.417	2.020	4.111	4.800	0.619	0.239	0.239	0.239	7
29011	Hamilton	Burlington/Leeds	57	0.021	0.029	0.037	0.047	0.075	0.097	0.098	0.042	0.037	0.037	0.037	0
29025	Hamilton	Barton/Wentworth	58	0.008	0.013	0.017	0.026	0.059	0.104	0.110	0.027	0.019	0.019	0.019	0
29102	Hamilton	467 Beach Blvd	58	0.004	0.010	0.018	0.026	0.035	0.054	0.069	0.019	0.014	0.014	0.014	0
29114	Hamilton	Vickers Rd/East 18Th St	53	0.001	0.003	0.004	0.006	0.025	0.036	0.038	0.008	0.004	0.004	0.004	0
31058	Toronto	Mosley/Leslie Sts	122	0.001	0.005	0.006	0.010	0.016	0.027	0.028	0.008	0.006	0.006	0.006	0
46047	Mississauga	Mississauga Rd S/Port St	28	0.003	0.005	0.008	0.012	0.024	0.030	0.030	INS	INS	INS	INS	0
46117	Mississauga	Meadow Pk, Apple Lane Club	56	0.001	0.001	0.003	0.004	0.007	0.026	0.029	0.004	0.003	0.003	0.003	0
71042	Sault Ste Marie	Pumphouse, Bonney St	55	0.006	0.010	0.017	0.032	0.057	0.145	0.210	0.029	0.017	0.017	0.017	0



TABLE 21 Vanadium (V) in TSP Statistics (1997)

Unit = micrograms/m<sup>3</sup>V 24-hour AAQC is 2.0 micrograms/m<sup>3</sup>

Stn	City	Location	Number of Samples	P E R C E N T I L E S							Arith		Geom		# of times above Criterion 24 h
				10%	30%	50%	70%	90%	99%	Max	Mean	Mean	Mean	Mean	
12007	Windsor	Wright/Water St	57	0.001	0.002	0.004	0.006	0.012	0.020	0.027	0.006	0.004	0.004	0.004	0
12008	Windsor	467 University Av W	59	0.001	0.001	0.001	0.004	0.009	0.026	0.028	0.004	0.004	0.002	0.002	0
12011	Windsor	Drouillard Rd/Richmond St	47	0.001	0.001	0.004	0.007	0.012	0.030	0.030	0.005	0.005	0.003	0.003	0
12013	Windsor	Filtrat Pkt 3665 Wyandotte St E	52	0.001	0.003	0.006	0.011	0.021	0.027	0.027	0.009	0.009	0.005	0.005	0
12015	Windsor	Sewage Sln Hwy 18/Prospect	56	0.001	0.001	0.003	0.005	0.012	0.030	0.034	0.005	0.005	0.003	0.003	0
12016	Windsor	College/South St	56	0.001	0.002	0.005	0.009	0.026	0.031	0.032	0.008	0.008	0.005	0.005	0
12038	Windsor	2885 Howard Av	56	0.004	0.007	0.017	0.026	0.042	0.078	0.086	0.021	0.013	0.013	0.013	0
12058	Windsor	Columbus Centre	56	0.001	0.001	0.002	0.007	0.010	0.022	0.026	0.005	0.005	0.003	0.003	0
12060	Windsor	2335 Dougall Ave	38	0.001	0.002	0.004	0.008	0.013	0.028	0.032	INS	INS	INS	INS	0
12061	Amherstburg	1.4 km NW Allied Chem	55	0.001	0.001	0.002	0.006	0.013	0.025	0.029	0.005	0.005	0.003	0.003	0
14016	Courtright	Hwy40 (OPP Lambton GS)	59	0.001	0.001	0.002	0.008	0.028	0.063	0.068	0.010	0.003	0.003	0.003	0
14030	Courna	Rt1 (W of House)	53	0.001	0.001	0.001	0.002	0.007	0.018	0.020	0.003	0.003	0.002	0.002	0
15025	London	900 Highbury Ave.	59	0.001	0.001	0.001	0.001	0.003	0.005	0.006	0.001	0.001	0.001	0.001	0
27052	Thorold	185 Queen St S	54	0.001	0.007	0.013	0.024	0.093	0.294	0.490	0.035	0.013	0.013	0.013	0
29011	Hamilton	Burlington/Leeds	57	0.001	0.005	0.008	0.012	0.023	0.047	0.049	0.010	0.010	0.006	0.006	0
29025	Hamilton	Barton/Wentworth	58	0.001	0.001	0.003	0.007	0.018	0.040	0.042	0.007	0.003	0.003	0.003	0
29102	Hamilton	467 Beach Blvd	58	0.001	0.001	0.005	0.011	0.021	0.026	0.028	0.008	0.004	0.004	0.004	0
29114	Hamilton	Vickers Rd/East 18Th St	53	0.001	0.001	0.001	0.003	0.010	0.014	0.016	0.004	0.002	0.002	0.002	0
31058	Toronto	Mosley/Leslie Sts	122	0.001	0.001	0.001	0.003	0.006	0.010	0.012	0.003	0.002	0.002	0.002	0
46047	Mississauga	Mississauga Rd S/Port St	28	0.001	0.002	0.005	0.006	0.012	0.025	0.025	INS	INS	INS	INS	0
46117	Mississauga	Meadow Pk, Apple Lane Club	56	0.001	0.001	0.001	0.003	0.006	0.019	0.021	0.003	0.003	0.002	0.002	0
71042	Sault Ste Marie	Pumphouse, Donney St	55	0.001	0.002	0.007	0.018	0.037	0.085	0.120	0.015	0.006	0.006	0.006	0

TABLE 22 Copper (Cu) in TSP Statistics ( 1997)

Unit = micrograms/m<sup>3</sup>Cu 24-hour AAQC is 50 micrograms/m<sup>3</sup>

Stn	City	Location	Number of Samples	P E R C E N T I L E S							Arith Mean	Geom Mean	# of times Above Criterion	
				10	30	50	70	90	99	Max			Mean	24 h
12007	Windsor	Wright/Water St	57	0.01	0.01	0.02	0.03	0.04	0.06	0.06	0.02	0.02	0	
12008	Windsor	467 University Av W	59	0.01	0.01	0.02	0.03	0.04	0.06	0.07	0.02	0.02	0	
12011	Windsor	Drouillard Rd/Richmond St	47	0.01	0.02	0.03	0.04	0.05	0.07	0.07	0.03	0.03	0	
12013	Windsor	Fillrat Pkt 3665 Wyandotte St E	52	0.01	0.02	0.02	0.03	0.04	0.04	0.05	0.02	0.02	0	
12015	Windsor	Sewage Sln Hwy 18/Prospect	56	0.01	0.02	0.03	0.03	0.05	0.07	0.09	0.03	0.02	0	
12016	Windsor	College/South St	56	0.01	0.01	0.02	0.03	0.05	0.08	0.09	0.02	0.02	0	
12038	Windsor	2885 Howard Av	56	0.03	0.05	0.07	0.10	0.13	0.29	0.32	0.08	0.07	0	
12058	Windsor	Columbus Centre	56	0.01	0.02	0.03	0.04	0.05	0.07	0.08	0.03	0.02	0	
12060	Windsor	2335 Dougall Ave	38	0.01	0.02	0.03	0.05	0.07	0.09	0.09	INS	INS	0	
12061	Amherstburg	1.4 km NW Allied Chem	55	0.01	0.01	0.02	0.03	0.05	0.08	0.10	0.03	0.02	0	
14016	Courtright	Hwy40 (OPP Lambton GS)	59	0.07	0.15	0.21	0.31	0.48	0.77	0.89	0.25	0.20	0	
14030	Corunna	Rr1 (W of House)	53	0.01	0.02	0.03	0.06	0.11	0.13	0.14	0.05	0.03	0	
15025	London	900 Highbury Ave.	59	0.13	0.20	0.33	0.50	0.67	0.98	1.20	0.38	0.29	0	
27052	Thorold	185 Queen St S	54	0.02	0.04	0.09	0.13	0.20	0.37	0.40	0.10	0.07	0	
29011	Hamilton	Burlington/Leeds	57	0.05	0.06	0.08	0.09	0.12	0.64	0.87	0.10	0.08	0	
29025	Hamilton	Barton/Wentworth	58	0.06	0.08	0.10	0.17	0.23	0.32	0.33	0.13	0.11	0	
29102	Hamilton	467 Beach Blvd	58	0.02	0.04	0.05	0.07	0.11	0.13	0.14	0.06	0.05	0	
29114	Hamilton	Vickers Rd/East 18Th St	53	0.02	0.02	0.03	0.04	0.05	0.07	0.09	0.03	0.03	0	
31058	Toronto	Mosley/Leslie Sts	122	0.05	0.07	0.09	0.13	0.17	0.25	0.52	0.11	0.09	0	
46047	Mississauga	Mississauga Rd S/Port St	28	0.03	0.07	0.08	0.13	0.16	0.25	0.27	INS	INS	0	
46117	Mississauga	Meadow Pk, Apple Lane Club	56	0.10	0.12	0.14	0.17	0.20	0.22	0.22	0.14	0.13	0	
71042	Sault Ste Marie	Pumphouse, Bonney St	55	0.07	0.11	0.13	0.16	0.27	0.35	0.36	0.15	0.13	0	

**TABLE 23 Nitrate (NO<sub>3</sub><sup>-</sup>) in TSP Statistics (1997)**

Unit = micrograms/m<sup>3</sup>

Stn	City	Location	Number of Samples	P E R C E N T I L E S					Arith Mean	Geom Mean
				10%	30%	50%	70%	90%		
12007	Windsor	Wright/Water St	57	2.2	2.8	4.0	5.5	8.6	13.4	15.0
12008	Windsor	467 University Av W	59	2.4	3.4	4.8	6.8	9.4	15.4	16.6
12015	Windsor	Sewage St Hwy 18/Prospect	56	2.4	3.7	5.1	6.7	9.2	15.2	16.6
12016	Windsor	College/South St	56	2.5	3.4	4.6	6.2	8.7	14.3	16.1
12038	Windsor	2885 Howard Av	56	2.3	3.7	4.8	6.9	10.8	21.9	28.8
12053	Amherstburg	415 Front St	54	2.5	3.5	4.9	6.7	10.2	13.7	14.4
12058	Windsor	Columbus Centre	56	2.1	3.1	4.3	6.3	8.7	13.0	14.3
14016	Courtright	Hwy40 (OPP Lambton GS)	59	1.4	2.4	3.4	5.7	7.8	14.0	18.2
22904	Nanticoke	Walpole S P's Sandusk Rd	55	1.8	3.7	5.4	7.4	10.2	12.1	12.2
29011	Hamilton	Burlington/Leeds	57	1.4	2.7	3.2	5.0	8.2	9.7	9.9
29025	Hamilton	Barton/Wentworth	58	1.5	2.6	4.1	5.7	9.2	13.2	14.6
29102	Hamilton	467 Beach Blvd	58	1.6	3.1	4.2	6.0	9.2	11.5	11.7
29114	Hamilton	Vickers Rd/East 18th St	53	1.6	3.3	4.9	7.0	9.9	12.2	12.6

**TABLE 24 Sulphate (SO<sub>4</sub><sup>2-</sup>) in TSP Statistics (1997)**

Unit = micrograms/m<sup>3</sup>

Stn	City	Location	Number of Samples	P E R C E N T I L E S					Arith Mean	Geom Mean
				10%	30%	50%	70%	90%		
12007	Windsor	Wright/Water St	57	10.2	13.5	15.9	18.1	21.2	24.3	26.7
12008	Windsor	467 University Av W	59	8.3	10.1	12.2	15.6	19.3	26.3	27.2
12015	Windsor	Sewage St Hwy 18/Prospect	56	9.3	12.1	14.0	17.1	22.2	26.7	28.5
12016	Windsor	College/South St	56	9.3	11.6	13.9	14.9	19.6	28.1	31.5
12038	Windsor	2885 Howard Av	56	8.4	10.3	13.1	16.1	21.1	29.2	30.6
12053	Amherstburg	415 Front St	54	8.2	10.7	13.0	14.7	18.6	36.7	47.5
12058	Windsor	Columbus Centre	56	8.1	9.8	12.5	14.7	17.4	24.6	25.5
14016	Courtright	Hwy40 (OPP Lambton GS)	59	6.9	9.1	11.7	14.1	18.1	21.4	22.0
22904	Nanticoke	Walpole S P's Sandusk Rd	55	7.0	10.5	12.5	14.3	21.8	36.7	38.8
29011	Hamilton	Burlington/Leeds	57	8.7	11.0	13.3	15.7	20.9	24.2	24.3
29025	Hamilton	Barton/Wentworth	58	9.4	11.2	13.2	17.7	23.1	25.8	26.8
29102	Hamilton	467 Beach Blvd	58	9.1	12.6	14.4	18.0	21.1	36.0	48.0
29114	Hamilton	Vickers Rd/East 18th St	53	8.5	10.3	12.1	15.9	20.8	26.5	26.6

TABLE 25 Inhalable Particles (PM<sub>10</sub>) 24-Hour Statistics (1997)Unit =micrograms/m<sup>3</sup>24h PM<sub>10</sub> Interim AAQC is 50 ug/m<sup>3</sup>

Stn	City	Location	Number of Samples	P E R C E N T I L E S										Arith		Geom		% of days >50
				10%	30%	50%	70%	90%	99%	Max.	Mean	Max.	Mean	Mean	Mean	Mean	Mean	
12507	Windsor	Wright/Water St	54	15.0	20.9	24.5	28.1	36.4	54.8	58.0	25.9	58.0	23.9	25.9	23.9	23.9	23.9	3.7
12508	Windsor	467 University Ave W	54	13.3	16.0	23.5	27.0	39.4	60.2	65.0	24.3	65.0	22.2	24.3	22.2	24.3	22.2	3.7
12513	Windsor	3665 Wyndotte St E	54	12.0	20.0	26.5	33.2	55.0	79.0	79.0	30.5	79.0	26.1	30.5	26.1	30.5	26.1	14.8
14550	Sarnia	6th Line, Moore TWP	48	6.0	12.1	15.5	20.9	29.3	43.1	45.0	17.3	45.0	14.6	17.3	14.6	17.3	14.6	0.0
14564	Sarnia	Centennial PK/Front St	56	9.5	13.5	17.0	25.0	34.0	44.1	49.0	20.1	49.0	17.6	20.1	17.6	20.1	17.6	0.0
15525	London	900 Highbury Ave. E.	57	8.0	12.0	16.0	21.2	26.4	42.8	45.0	17.5	45.0	15.4	17.5	15.4	17.5	15.4	0.0
22304	Nanticoke	Walpole Ps Sandusk Rd	59	7.0	11.0	13.0	17.0	28.2	39.6	46.0	15.3	46.0	13.3	15.3	13.3	15.3	13.3	0.0
27308	St Catharines	71 King Street	56	9.5	14.0	18.0	23.0	29.5	45.7	49.0	19.6	49.0	17.8	19.6	17.8	19.6	17.8	0.0
27352	Thorold	185 Queen St S	59	17.6	23.4	29.0	43.8	70.2	104.4	134.0	36.8	134.0	31.6	36.8	31.6	36.8	31.6	18.6
29300	Hamilton	PM10 Elgin/Kelly St	56	10.0	13.5	21.0	23.0	41.0	57.3	60.0	22.0	60.0	19.1	22.0	19.1	22.0	19.1	5.4
29302	Hamilton	467 Beach Blvd	56	8.0	18.0	25.0	30.0	41.0	56.2	60.0	25.4	60.0	22.1	25.4	22.1	25.4	22.1	5.4
29313	Hamilton	Gertrude/Depew	50	17.0	21.7	26.5	34.0	65.1	88.6	91.0	33.1	91.0	29.0	33.1	29.0	33.1	29.0	14.0
29324	Hamilton	Buchanan Park Ps	49	9.0	13.0	16.0	22.6	31.6	51.0	52.0	19.4	52.0	17.3	19.4	17.3	19.4	17.3	2.0
31327	Toronto	Queen/University	52	14.0	19.0	24.5	32.0	46.9	60.5	62.0	27.8	62.0	25.0	27.8	25.0	27.8	25.0	5.8
35127	Etobicoke	Evans/Arnold	54	14.0	19.0	27.0	31.0	36.0	46.5	47.0	25.7	47.0	24.0	25.7	24.0	25.7	24.0	0.0
46127	Mississauga	Bronte Rd/Woburn Cr	54	10.3	14.9	18.0	24.0	33.4	46.0	46.0	20.4	46.0	18.5	20.4	18.5	20.4	18.5	0.0
56051	Cornwall	Meadwood Park	53	9.0	11.6	18.0	22.0	37.6	52.2	61.0	19.7	61.0	17.0	19.7	17.0	19.7	17.0	1.9
62135	Fort Frances	Memorial PK Bedford/Third	46	14.0	20.5	25.5	30.0	38.5	70.5	75.0	26.8	75.0	24.2	26.8	24.2	26.8	24.2	6.5
62135	Fort Frances	Legion 250 Church	54	5.3	9.9	13.0	22.0	35.4	64.3	85.0	17.8	85.0	13.6	17.8	13.6	17.8	13.6	1.9
63201	Thunder Bay	615 James St S	59	6.0	10.0	14.0	17.0	29.4	48.7	51.0	16.0	51.0	13.5	16.0	13.5	16.0	13.5	1.7
71342	Sault Ste Marie	Bonney St	60	11.0	18.0	24.5	44.3	57.5	127.4	128.0	34.4	128.0	26.4	34.4	26.4	34.4	26.4	20.0
71368	Sault Ste Marie	Wm Merrifield S	60	8.0	12.0	14.5	22.0	27.1	46.9	51.0	17.6	51.0	15.4	17.6	15.4	17.6	15.4	1.7
77326	Sudbury	19 Lisgar St	57	7.6	9.0	13.0	16.0	22.4	33.3	35.0	13.8	35.0	12.5	13.8	12.5	13.8	12.5	0.0
77570	Copper Cliff	Market St	60	6.0	9.7	13.0	17.3	24.0	34.6	37.0	14.4	37.0	12.4	14.4	12.4	14.4	12.4	0.0

Note: measurements made by modified hi-vol sampler



**TABLE 26 Copper (Cu) in PM<sub>10</sub> Statistics ( 1997)**

Unit = micrograms/m<sup>3</sup>

Stn	City	Location	Number of Samples	P E R C E N T I L E S							Max	Arith Mean	Geom Mean
				10	30	50	70	90	99				
12507	Windsor	Wright/Water St	54	0.005	0.005	0.005	0.005	0.005	0.025	0.030	0.007	0.006	
12508	Windsor	467 University Ave W	54	0.005	0.005	0.005	0.005	0.005	0.020	0.020	0.006	0.005	
12513	Windsor	3665 Wyndotte St E	54	0.005	0.005	0.005	0.005	0.020	0.040	0.040	0.010	0.007	
14550	Samia	6th Line, Moore TWP	48	0.005	0.005	0.005	0.005	0.005	0.005	0.005	0.005	0.005	
14564	Samia	Centennial PK/Front St	56	0.005	0.005	0.005	0.005	0.020	0.030	0.030	0.008	0.007	
15525	London	900 Highbury Ave. E.	57	0.005	0.005	0.005	0.005	0.020	0.029	0.040	0.008	0.007	
222304	Nanticoke	Walpole Ps Sandusk Rd	59	0.005	0.005	0.005	0.005	0.005	0.020	0.020	0.006	0.005	
27308	St Catharines	71 King Street	56	0.005	0.005	0.005	0.020	0.025	0.035	0.040	0.012	0.009	
27352	Thorold	185 Queen St S	59	0.005	0.005	0.005	0.005	0.020	0.034	0.040	0.008	0.006	
29300	Hamilton	Elgin/Kelly St	56	0.013	0.020	0.030	0.040	0.050	0.084	0.100	0.031	0.025	
29302	Hamilton	467 Beach Blvd	56	0.005	0.005	0.005	0.020	0.020	0.035	0.040	0.013	0.010	
29313	Hamilton	Gertrude/Depew	50	0.005	0.005	0.020	0.030	0.090	0.135	0.140	0.032	0.017	
29324	Hamilton	Buchanan Park Ps	49	0.005	0.005	0.005	0.030	0.030	0.035	0.040	0.009	0.007	
31327	Toronto	Queen/University	52	0.005	0.020	0.020	0.030	0.040	0.050	0.050	0.023	0.018	
35127	Etobicoke	Evans/Arnold	54	0.005	0.005	0.005	0.020	0.020	0.030	0.030	0.011	0.008	
44127	Oakville	Bronte Rd/Woburn Cr	54	0.005	0.005	0.005	0.005	0.020	0.020	0.020	0.009	0.007	
46127	Mississauga	Meadwood Park	53	0.005	0.020	0.020	0.024	0.040	0.050	0.050	0.023	0.019	
56051	Cornwall	Memorial Pk Bedford/Third	46	0.005	0.020	0.020	0.030	0.035	0.056	0.070	0.022	0.018	
62135	Fort Frances	Legion 250 Church	54	0.005	0.005	0.005	0.005	0.005	0.017	0.030	0.005	0.005	
63201	Thunder Bay	615 James St S	59	0.005	0.005	0.005	0.005	0.005	0.024	0.030	0.006	0.005	
71342	Sault Ste Marie	Bonney St	60	0.005	0.005	0.005	0.005	0.005	0.024	0.030	0.006	0.006	
71368	Sault Ste Marie	Wm Merrifield S	60	0.005	0.005	0.005	0.020	0.020	0.030	0.030	0.011	0.008	
77326	Sudbury	19 Lisgar St	57	0.005	0.02	0.04	0.08	0.164	0.378	0.630	0.065	0.032	
77570	Copper Cliff	Market St	60	0.020	0.040	0.075	0.149	0.626	3.646	4.000	0.343	0.092	

Note: measurements made by modified hi-vol sampler

TABLE 27 Iron (Fe) in PM<sub>10</sub> Statistics (1997)Unit: micrograms/m<sup>3</sup>

Stn	City	Location	Number of Samples	P E R C E N T I L E S							Arith.		Geom Mean
				10%	30%	50%	70%	90%	99%	Max	Mean	Mean	
12507	Windsor	Wright/Water St	54	0.20	0.59	0.80	1.10	1.74	2.89	3.10	0.93	0.70	
12508	Windsor	467 University Ave W	54	0.20	0.30	0.40	0.60	0.97	1.49	1.60	0.52	0.43	
12513	Windsor	3665 Wyndolite St E	54	0.20	0.39	0.70	1.43	3.62	6.78	8.10	1.38	0.72	
14550	Samia	6th Line, Moore TWP	48	0.05	0.10	0.10	0.20	0.30	0.45	0.50	0.16	0.12	
14564	Samia	Centennial Pk/Front St	56	0.10	0.10	0.20	0.25	0.40	0.55	0.60	0.21	0.18	
15525	London	900 Highbury Ave. E.	57	0.05	0.10	0.20	0.30	0.40	0.64	0.70	0.22	0.17	
22304	Nanticoke	Walpole Pk Sandusk Rd	59	0.05	0.10	0.20	0.30	0.60	0.90	0.90	0.25	0.18	
27308	St Catharines	71 King Street	56	0.10	0.20	0.20	0.30	0.40	0.55	0.60	0.25	0.22	
27352	Thorold	185 Queen St S	59	0.20	0.40	0.60	0.90	1.92	4.00	5.10	0.87	0.60	
29300	Hamilton	Elgin/Kelly St	56	0.20	0.30	0.40	0.60	1.85	3.87	5.30	0.72	0.46	
29302	Hamilton	467 Beach Blvd	56	0.10	0.45	1.15	1.90	2.20	3.60	4.20	1.23	0.75	
29313	Hamilton	Gertrude/Depew	50	0.49	0.70	1.05	2.23	9.61	13.02	14.00	2.72	1.42	
29324	Hamilton	Buchanan Park Pk	49	0.10	0.20	0.30	0.40	1.56	3.78	4.40	0.59	0.30	
31327	Toronto	Queen/University	52	0.30	0.40	0.55	0.80	1.49	1.95	2.10	0.71	0.58	
35127	Etobicoke	Evans/Arnold	54	0.20	0.30	0.50	0.60	0.87	1.35	1.40	0.54	0.46	
44127	Oakville	Bronte Rd/Woburn Cr	54	0.10	0.20	0.30	0.40	0.70	1.25	1.30	0.36	0.28	
46127	Mississauga	Meadow Park	53	0.05	0.10	0.20	0.30	0.60	0.90	0.90	0.26	0.18	
56051	Corwall	Memorial Pk Bedford/Third	46	0.08	0.10	0.20	0.25	0.40	0.56	0.60	0.22	0.18	
62135	Fort Frances	Legion 250 Church	54	0.07	0.19	0.30	0.40	0.70	0.95	1.00	0.32	0.23	
63201	Thunder Bay	615 James St S	59	0.10	0.20	0.50	0.60	1.40	1.89	2.30	0.56	0.39	
71342	Sault Ste Marie	Bomey St	60	0.30	0.77	1.65	2.63	7.18	29.84	44.00	3.39	1.41	
71368	Sault Ste Marie	Wm Merrifield S	60	0.10	0.20	0.45	0.80	2.30	5.51	7.40	0.86	0.42	
77326	Sudbury	19 Lisgar St	57	0.10	0.20	0.30	0.40	0.60	1.12	1.40	0.33	0.27	
77570	Copper Cliff	Market St	60	0.10	0.20	0.30	0.40	1.00	3.42	4.90	0.51	0.32	

Note: measurements made by modified hi-vol sampler

TABLE 28 Manganese (Mn) in PM<sub>10</sub> Statistics (1997)Unit = micrograms/m<sup>3</sup>

Stn	City	Location	Number of Samples	P E R C E N T I L E S							Arith		Geom	
				10%	30%	50%	70%	90%	99%	Max	Mean	Mean	Mean	Mean
12507	Windsor	Wright/Water St	54	0.006	0.016	0.022	0.030	0.039	0.064	0.068	0.024	0.019		
12508	Windsor	467 University Ave. W	54	0.008	0.010	0.014	0.020	0.036	0.054	0.066	0.018	0.014		
12513	Windsor	3665 Wyndotte St E	54	0.006	0.012	0.027	0.063	0.224	0.374	0.390	0.074	0.030		
14550	Sarnia	6th Line, Moore TWP	48	0.001	0.001	0.004	0.006	0.009	0.013	0.014	0.005	0.003		
14564	Sarnia	Centennial PK/Front St	56	0.001	0.004	0.008	0.008	0.012	0.023	0.024	0.007	0.006		
15525	London	900 Highbury Ave. E.	57	0.004	0.006	0.010	0.012	0.020	0.028	0.028	0.011	0.009		
22304	Nanticoke	Walpole P's Sandusk Rd	59	0.001	0.004	0.006	0.012	0.022	0.031	0.032	0.009	0.007		
27308	St Catharines	71 King Street	56	0.004	0.009	0.014	0.018	0.021	0.026	0.026	0.013	0.012		
27352	Thorold	185 Queen St S	59	0.008	0.018	0.024	0.037	0.077	0.127	0.150	0.034	0.024		
29300	Hamilton	Elgin/Kelly St	56	0.010	0.018	0.021	0.029	0.100	0.252	0.290	0.043	0.027		
29302	Hamilton	467 Beach Blvd	56	0.006	0.020	0.056	0.084	0.120	0.199	0.210	0.060	0.034		
29313	Hamilton	Gertrude/Depew	50	0.027	0.042	0.069	0.153	0.471	0.706	0.730	0.156	0.087		
29324	Hamilton	Buchanan Park P's	49	0.006	0.009	0.012	0.024	0.078	0.185	0.190	0.031	0.016		
31327	Toronto	Queen/University	52	0.014	0.020	0.025	0.032	0.052	0.064	0.070	0.028	0.025		
35127	Etobicoke	Evans/Arnold	54	0.014	0.018	0.025	0.032	0.048	0.066	0.066	0.028	0.025		
44127	Oakville	Bronte Rd/Woburn Cr	54	0.005	0.008	0.014	0.016	0.029	0.052	0.062	0.016	0.012		
46127	Mississauga	Meadowood Park	53	0.001	0.006	0.008	0.013	0.024	0.034	0.038	0.011	0.007		
56051	Corwall	Memorial Pk Bedford/Third	46	0.004	0.006	0.008	0.010	0.014	0.020	0.022	0.008	0.007		
62135	Fort Frances	Legion 250 Church	54	0.001	0.004	0.006	0.010	0.018	0.034	0.042	0.009	0.006		
63201	Thunder Bay	615 James St S	59	0.004	0.006	0.012	0.018	0.036	0.052	0.066	0.015	0.010		
71342	Sault Ste Marie	Bonney St	60	0.016	0.043	0.089	0.163	0.264	0.629	0.930	0.129	0.075		
71368	Sault Ste Marie	Wm Merrifield S	60	0.004	0.012	0.022	0.055	0.091	0.197	0.250	0.042	0.021		
77326	Sudbury	19 Lisgar St	57	0.004	0.006	0.006	0.010	0.017	0.028	0.028	0.009	0.007		
77570	Copper Cliff	Market St	60	0.001	0.004	0.006	0.008	0.014	0.026	0.034	0.008	0.006		

Note: measurements made by modified hi-vol sampler

TABLE 29 Sulphate (SO<sub>4</sub><sup>2-</sup>) in PM<sub>10</sub> Statistics (1997)

Unit =micrograms/m<sup>3</sup>

Stn	City	Location	Number of Samples	P E R C E N T I L E S							Arith		Geom
				10%	30%	50%	70%	90%	99%	Max	Mean	Mean	
12507	Windsor	Wright/Water St	54	2.0	3.6	4.2	5.2	7.9	17.2	18.5	5.0	4.3	
12508	Windsor	467 University Ave W	54	1.8	2.9	4.0	4.8	7.5	17.7	19.5	4.8	3.9	
12513	Windsor	3665 Wyndotte St E	54	1.6	2.9	3.8	4.6	7.7	16.6	18.3	4.5	3.7	
14550	Samia	6th Line, Moore TWP	48	1.7	2.4	3.8	5.6	9.4	13.0	13.2	4.8	3.7	
14564	Samia	Centennial PK/Front St	56	1.5	2.8	3.8	6.6	9.4	14.4	14.6	5.1	4.0	
15525	London	900 Highbury Ave. E.	57	1.2	2.0	2.8	3.8	5.9	15.1	16.8	3.6	2.8	
22304	Nanticoke	Walpole P's Sandusk Rd	59	1.5	2.6	3.6	5.0	8.7	17.2	19.9	4.6	3.6	
27308	St Catharines	71 King Street	56	1.5	2.5	3.1	4.3	8.6	15.1	18.3	4.2	3.4	
27352	Thorold	185 Queen St S	59	1.8	2.5	3.2	4.5	8.3	14.8	18.6	4.3	3.5	
29300	Hamilton	Elgin/Kelly St	56	1.4	2.6	3.4	4.8	8.1	15.1	17.8	4.4	3.5	
29302	Hamilton	467 Beach Blvd	56	1.5	3.1	3.9	5.0	7.7	14.0	16.7	4.5	3.8	
29313	Hamilton	Gertrude/Depew	50	1.9	3.2	4.2	4.7	7.7	13.1	15.8	4.5	3.9	
29324	Hamilton	Buchanan Park P's	49	1.4	2.6	3.6	4.8	6.9	10.1	10.6	4.0	3.5	
31327	Toronto	Queen/University	52	1.5	2.5	3.5	4.5	8.1	13.0	14.8	4.2	3.5	
35127	Ethiobioke	Evans/Arnold	54	1.5	2.8	3.8	5.0	8.8	10.4	10.8	4.4	3.7	
44127	Oakville	Bronte Rd/Woburn Cr	54	1.5	2.6	3.3	4.8	7.7	11.2	11.2	4.1	3.4	
46127	Mississauga	Meadwood Park	53	1.5	2.6	3.3	5.2	8.0	17.3	20.2	4.6	3.7	
56051	Cornwall	Memorial Pk Bedford/Third	46	2.0	3.3	5.3	7.7	11.9	22.2	23.7	6.6	5.1	
62135	Fort Frances	Legion 250 Church	54	0.7	1.2	1.5	2.7	5.3	10.8	13.4	2.4	1.7	
63201	Thunder Bay	615 James St S	59	0.7	1.0	1.3	1.6	3.3	4.8	4.8	1.6	1.3	
71342	Sault Ste Marie	Bonney St	60	0.8	1.8	2.6	4.4	6.9	11.6	15.7	3.5	2.7	
71368	Sault Ste Marie	Wm Merrifield S	60	0.8	1.2	1.8	2.8	4.5	7.6	7.8	2.4	1.9	
77326	Sudbury	19 Lisgar St	57	0.7	1.2	2.0	3.0	5.0	7.3	7.5	2.4	1.9	
77570	Copper Cliff	Market St	60	0.7	1.2	2.1	2.8	5.1	6.8	6.9	2.5	1.9	

Note: measurements made by modified hi-vol sampler



**TABLE 30 10-YEAR TREND FOR SO<sub>2</sub>**

Annual Mean (ppb)

City	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997
BURLINGTON	4.0	7.0	6.0	3.0	6.0	6.0	4.0	2.0	4.0	5.1
CORNWALL	6.0	7.0	5.0	5.0	5.0	7.0	12.0	5.0	5.0	3.9
ETOBICOKE	6.0	5.0	6.0	6.0	8.0	5.0	4.0	3.0	4.0	4.9
HAMILTON	8.0	10.0	7.0	7.0	7.0	6.0	5.0	8.0	9.0	5.8
KITCHENER *	3.0	3.0	n/a	3.0	3.0	3.0	3.0	2.0	3.0	3.1
LONDON #	4.0	6.0	4.0	5.0	4.0	3.0	4.0	2.0	3.0	2.5
LONG POINT	2.0	3.0	4.0	4.0	5.0	2.0	3.0	2.0	3.0	2.7
MISSISSAUGA	4.0	4.0	4.0	5.0	6.0	3.0	3.0	2.0	n/a	n/a
NIAGARA FALLS	2.0	5.0	5.0	5.0	5.0	4.0	4.0	3.0	5.0	n/a
NORTH YORK ^	2.0	2.0	2.0	2.0	3.0	4.0	3.0	2.0	5.0	4.4
OAKVILLE	5.0	6.0	5.0	5.0	4.0	5.0	4.0	2.0	5.0	4.8
OSHAWA	6.0	6.0	4.0	4.0	4.0	3.0	2.0	2.0	5.0	4.6
OTTAWA	2.0	3.0	2.0	3.0	2.0	2.0	1.0	1.0	5.0	6.3
SARNIA	9.0	8.0	12.0	9.0	9.0	10.0	9.0	6.0	7.0	8.5
SCARBOROUGH	8.0	6.0	6.0	4.0	3.0	3.0	3.0	4.0	6.0	5.2
SIMCOE	5.0	5.0	4.0	3.0	3.0	3.0	2.0	2.0	3.0	3.2
ST CATHARINES	11.0	6.0	4.0	5.0	5.0	3.0	3.0	5.0	6.0	5.8
STOUFFVILLE	3.0	4.0	3.0	4.0	3.0	3.0	4.0	3.0	3.0	3.3
SUDBURY	10.0	8.0	8.0	5.0	4.0	4.0	3.0	4.0	5.0	3.5
THUNDER BAY	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.4
THURTON	3.0	2.0	1.0	1.0	1.0	1.0	2.0	1.0	2.0	2.0
TORONTO	7.0	8.0	6.0	5.0	8.0	7.0	3.0	3.0	5.0	5.3
WINDSOR	11.0	8.0	7.0	7.0	6.0	6.0	6.0	5.0	10.0	6.7
COMPOSITE MEAN	5.3	5.3	4.8	4.3	4.5	4.0	3.8	3.0	4.5	4.2

\* Site changed location from Edna/Frederick St (26029) to West Ave/Homewood (26060) in 1990.

# Site changed from King/Rectory (15001) to 900 Highbury Ave (15025) in 1995

^ Site changed location from Science Centre (34002) to North York Central (34020) in 1992.

n/a - data not available

**TABLE 31 10-YEAR TREND FOR SP**

Annual Mean (COH units/1000ft)

City	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997
CORNWALL	0.10	0.11	0.19	0.17	0.19	0.22	0.19	0.22	0.26	0.15
ETOBICOKE	0.43	0.59	0.52	0.50	0.46	0.51	0.38	0.33	0.29	0.26
HAMILTON	0.46	0.50	0.42	0.41	0.45	0.48	0.47	0.39	0.43	0.33
LONDON *	0.25	0.33	0.28	0.25	0.24	0.25	0.25	0.20	0.21	0.17
NIAGARA FALLS	0.20	0.32	0.25	0.24	0.20	0.21	0.27	0.24	0.23	n/a
NORTH YORK #	0.34	0.41	0.30	0.33	0.31	0.35	0.40	0.38	0.37	0.28
OSHAWA	0.31	0.37	0.37	0.35	0.31	0.36	0.37	0.23	0.26	0.24
OTTAWA	0.23	0.36	0.35	0.25	0.28	0.24	0.22	0.18	0.18	0.16
SARNIA	0.24	0.30	0.28	0.24	0.22	0.20	0.20	0.18	0.17	0.18
SCARBOROUGH	0.37	0.42	0.36	0.34	0.30	0.30	0.34	0.32	0.28	0.28
SUDBURY	0.21	0.18	0.12	0.17	0.17	0.21	0.19	0.14	0.15	0.12
ST CATHARINES	0.23	0.25	0.25	0.25	0.26	0.27	0.25	0.24	0.24	0.2
TORONTO	0.34	0.37	0.38	0.40	0.39	0.42	0.38	0.38	0.44	0.35
WINDSOR	0.44	0.40	0.40	0.30	0.34	0.36	0.28	0.31	0.26	0.15
COMPOSITE MEAN	0.30	0.35	0.32	0.30	0.29	0.31	0.30	0.27	0.27	0.22

\* Site changed from King/Rectorry (15001) to 900 Highbury Ave (15025)

# Site changed location from Science Centre (34002) to North York Central (34020) in 1992.

n/a - data not available

**TABLE 32 10-YEAR TREND FOR TRS**

Annual Mean (ppb)

City	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997
CORNWALL	2.5	3.4	3.4	2.9	2.3	1.8	2.5	1.3	1.2	2.0
FORT FRANCES	5.9	4.9	5.5	4.3	4.2	4.2	2.4	2.5	2.7	2.6
HAMILTON	0.8	0.8	0.9	0.8	0.6	0.7	1.1	1.2	1.4	1.0
MARATHON	2.2	1.5	1.1	0.9	0.5	0.7	0.9	0.5	0.4	0.2
OAKVILLE	1.4	1.1	1.3	1.6	0.5	1.0	1.3	0.3	1.3	1.3
RED ROCK	2.9	1.4	1.7	1.4	2.0	1.9	3.2	1.1	1.2	1.6
TERRACE BAY	2.1	1.4	1.3	1.3	1.7	1.7	1.1	1.7	1.3	1.0
TIVERTON	0.9	0.4	0.0	0.0	0.1	0.1	0.1	0.2	0.3	0.1
THUNDER BAY	1.0	1.0	0.2	0.2	0.3	0.2	0.3	0.3	0.8	1.1
COMPOSITE MEAN	2.1	1.7	1.7	1.5	1.1	1.3	1.4	1.0	1.1	1.2

**TABLE 33 10-YEAR TREND FOR CO**

Annual Mean (ppm)

CITY	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997
CORNWALL	0.6	0.8	0.6	0.8	0.5	0.8	0.5	0.6	0.6	1.1
ETOBICOKE	1.2	0.7	0.8	0.8	0.6	0.7	0.7	0.8	0.7	1.0
HAMILTON	1.2	1.2	1.2	1.1	1.2	1.1	0.8	0.6	1.0	0.7
KITCHENER *	0.9	1.1	n/a	0.6	0.5	0.4	0.3	0.3	0.4	0.2
LONDON #	0.5	0.9	0.6	0.7	0.7	0.6	0.5	0.1	0.0	0.3
NORTH YORK ^	0.8	0.8	1.0	0.7	1.0	1.1	0.9	0.5	0.9	0.7
OAKVILLE	0.9	0.9	0.5	0.5	0.3	0.7	0.7	0.5	0.7	0.3
OSHAWA	1.1	0.9	0.9	0.8	0.9	0.9	1.0	0.8	0.6	0.4
OTTAWA	0.5	0.7	0.7	1.0	1.1	0.9	0.8	0.6	0.7	0.4
SARNIA	0.3	0.3	0.3	0.2	0.3	0.2	0.2	0.1	0.2	0.2
SCARBOROUGH	1.1	1.0	1.2	1.2	1.0	0.8	1.0	1.0	1.1	0.6
ST CATHARINES	n/a	1.0	0.9	1.0	0.7	0.5	0.4	0.2	0.3	0.1
SUDBURY	0.3	0.4	0.5	0.3	0.1	0.1	0.1	0.0	0.1	0.0
TORONTO	0.6	0.9	1.1	1.1	1.0	1.1	1.0	0.7	1.3	1.2
WINDSOR	0.9	1.0	1.2	1.0	0.9	0.8	1.0	0.9	0.8	0.6
COMPOSITE MEAN	0.8	0.8	0.8	0.8	0.7	0.7	0.7	0.5	0.6	0.5

\* Site changed location from Edna/Frederick St (26029) to West Ave/Homewood (26060) in 1990.

# Site changed location from King/Rectorry to 900 Highbury Ave in 1995

^ Site changed location from Science Centre (34002) to North York Central (34020) in 1992.

n/a - data not available

**TABLE 34 10-YEAR TREND FOR NO<sub>2</sub>**

Annual Mean (ppb)

City	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997
CORNWALL	8.0	9.0	8.0	6.0	10.0	8.0	9.0	8.0	12.0	8.0
ETOBICOKE	21.0	30.0	26.0	25.0	26.0	26.0	27.0	25.0	25.0	26.7
HAMILTON	24.0	26.0	22.0	22.0	19.0	22.0	22.0	19.0	22.0	18.6
KITCHENER *	27.0	25.0	n/a	13.0	15.0	14.0	14.0	11.0	13.0	13.7
LONDON #	20.0	22.0	21.0	19.0	18.0	20.0	23.0	20.0	18.0	18.0
NORTH YORK ^	27.0	28.0	28.0	29.0	24.0	21.0	20.0	18.0	22.0	20.2
OAKVILLE	16.0	16.0	17.0	17.0	16.0	19.0	17.0	17.0	20.0	20.8
OSHAWA	24.0	24.0	19.0	18.0	18.0	19.0	18.0	20.0	19.0	18.6
OTTAWA	16.0	17.0	16.0	20.0	17.0	19.0	19.0	16.0	13.0	12.5
SARNIA	15.0	19.0	21.0	19.0	20.0	16.0	18.0	17.0	16.0	16.9
SCARBOROUGH	25.0	27.0	25.0	24.0	19.0	19.0	22.0	25.0	23.0	23.4
ST CATHARINES	18.0	21.0	16.0	16.0	12.0	17.0	17.0	14.0	16.0	13.8
SUDBURY	10.0	11.0	9.0	9.0	9.0	10.0	11.0	12.0	8.0	7.4
TORONTO	25.0	27.0	25.0	29.0	27.0	29.0	30.0	30.0	34.0	31.7
WINDSOR	30.0	27.0	25.0	25.0	25.0	26.0	28.0	25.0	26.0	23.8
COMPOSITE MEAN	20.4	21.9	19.9	19.4	18.3	19.0	19.7	18.5	19.1	18.3

\* Site changed location from Edna/Frederick St (26029) to West Ave/Homewood (26060) in 1990.

# Site changed location from King/Rectorry to 900 Highbury Ave in 1995

^ Site changed location from Science Centre (34002) to North York Central (34020) in 1992.

n/a - data not available



TABLE 35 10-YEAR TREND FOR NO

Annual Mean (ppb)

CITY	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997
CORNWALL	10.0	9.0	8.0	6.0	8.0	7.0	6.0	6.0	8.0	6.3
ETOBICOKE	26.0	29.0	23.0	19.0	25.0	22.0	23.0	19.0	22.0	18.6
HAMILTON	17.0	14.0	12.0	11.0	15.0	17.0	18.0	16.0	15.0	10.8
KITCHENER *	47.0	45.0	n/a	5.0	6.0	6.0	8.0	7.0	7.0	5.5
LONDON #	15.0	15.0	16.0	11.0	13.0	13.0	18.0	15.0	10.0	7.6
NORTH YORK ^	21.0	26.0	38.0	20.0	21.0	16.0	17.0	18.0	17.0	16.3
OAKVILLE	36.0	30.0	15.0	11.0	13.0	16.0	15.0	15.0	16.0	14.9
OSHAWA	14.0	18.0	20.0	14.0	14.0	17.0	19.0	18.0	15.0	16.4
OTTAWA	11.0	12.0	9.0	9.0	11.0	12.0	11.0	7.0	8.0	7.0
SARNIA	6.0	7.0	7.0	6.0	7.0	7.0	9.0	6.0	7.0	7.0
SCARBOROUGH	33.0	33.0	27.0	26.0	25.0	24.0	26.0	24.0	23.0	24.9
ST CATHARINES	10.0	11.0	11.0	8.0	14.0	12.0	10.0	10.0	13.0	10.3
SUDBURY	5.0	6.0	5.0	5.0	4.0	4.0	5.0	6.0	6.0	4.9
TORONTO	18.0	22.0	21.0	n/a	25.0	27.0	25.0	23.0	42.0	32.9
WINDSOR	14.0	15.0	16.0	19.0	18.0	17.0	17.0	15.0	16.0	15.9
COMPOSITE MEAN	18.9	19.5	16.3	12.1	14.6	14.5	15.1	13.7	15.0	13.3

\* Site changed location from Edna/Frederick St (26029) to West Ave/Homewood (26060) in 1990.

# Site change location from King/Rector (15001) to 900 Highbury Ave (15025) in 1995

^ Site changed location from Science Centre (34002) to North York Central (34020) in 1992.

n/a - data not available

TABLE 36 10-YEAR TREND FOR NO<sub>x</sub>

Annual Mean (ppb)

City	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997
CORNWALL	17.0	19.0	18.0	16.0	19.0	17.0	17.0	16.0	17.0	14.5
ETOBICOKE	46.0	61.0	50.0	44.0	51.0	49.0	49.0	45.0	47.0	45.2
HAMILTON	41.0	40.0	35.0	33.0	33.0	39.0	40.0	35.0	37.0	29.5
KITCHENER*	73.0	70.0	39.0	21.0	22.0	21.0	23.0	20.0	20.0	19.2
LONDON #	35.0	37.0	34.0	31.0	34.0	35.0	38.0	32.0	28.0	24.4
NORTH YORK ^	49.0	54.0	66.0	49.0	45.0	37.0	38.0	36.0	39.0	36.7
OAKVILLE	36.0	42.0	31.0	28.0	30.0	35.0	34.0	32.0	33.0	32.8
OSHAWA	36.0	42.0	40.0	32.0	33.0	36.0	37.0	36.0	35.0	34.9
OTTAWA	26.0	29.0	25.0	29.0	28.0	29.0	28.0	22.0	25.0	19.6
SARNIA	21.0	28.0	29.0	26.0	26.0	23.0	28.0	23.0	23.0	24.9
SCARBOROUGH	58.0	60.0	51.0	50.0	46.0	46.0	50.0	49.0	45.0	47.5
ST CATHARINES	29.0	33.0	27.0	24.0	27.0	30.0	28.0	25.0	29.0	24.5
SUDBURY	15.0	16.0	14.0	14.0	14.0	16.0	17.0	17.0	14.0	12.5
TORONTO	44.0	48.0	46.0	54.0	52.0	55.0	54.0	55.0	76.0	64.3
WINDSOR	44.0	42.0	41.0	42.0	42.0	42.0	42.0	38.0	39.0	39.3
COMPOSITE MEAN	38.0	41.4	36.4	32.9	33.5	34.0	34.9	32.1	33.8	31.3

\* Site changed location from Edna/Frederick St (26029) to West Ave/Homewood (26060) in 1990.

# Site change from King/Rectorry (15001) to 900 Highbury Ave (15025) in 1995

^ Site changed location from Science Centre (34002) to North York Central (34020) in 1992.

n/a - data not available

**TABLE 37 10-YEAR TREND FOR O<sub>3</sub>**

Annual Mean (ppb)

CITY	1988	1989	1990	1991	1992	1993	1994	1995	1996	1997
CORNWALL	24.0	20.4	21.2	20.7	20.8	21.6	21.7	23.5	21.0	22.8
ETOBICOKE	19.3	16.9	16.4	19.0	15.4	16.0	17.4	16.3	17.1	19.4
GRAND BEND	29.7	28.0	27.4	n/a	29.7	31.3	30.2	31.3	31.9	31.2
HAMILTON	17.9	16.7	17.6	19.9	16.9	16.9	17.0	18.0	17.3	18.1
KITCHENER *	21.6	19.9	n/a	27.2	22.7	23.2	24.4	25.1	23.8	23.4
LONDON #	23.7	22.9	22.1	22.7	20.3	22.8	23.1	21.7	23.1	22.8
LONG POINT	38.4	35.7	33.0	33.9	32.3	31.2	32.2	31.0	34.4	35.2
MANDAUMIN	30.0	28.4	23.7	28.1	23.5	24.5	24.6	24.0	23.4	27.9
MERLIN	31.5	27.2	26.0	28.4	24.3	23.7	24.2	28.0	28.6	27.0
MISSISSAUGA	17.7	18.6	17.8	18.6	15.6	16.1	19.5	19.2	19.4	20.0
OAKVILLE	20.9	22.1	22.2	22.1	19.3	21.0	22.5	20.4	21.1	20.8
OSHAWA	20.2	21.9	18.8	22.6	20.3	21.4	23.8	22.7	21.9	23.2
OTTAWA	20.7	20.9	21.5	20.8	17.4	18.1	19.7	20.9	18.9	20.6
SARNIA	22.6	25.3	21.4	23.4	21.3	22.6	21.4	22.2	25.2	24.5
SCARBOROUGH	17.7	17.9	17.6	19.1	14.3	17.0	18.2	19.3	18.9	18.0
SIMCOE	31.2	28.6	26.3	29.1	25.1	27.8	30.2	30.7	29.9	28.6
ST CATHARINES	23.6	20.8	23.8	25.0	19.3	23.9	23.6	20.5	20.3	20.9
STOUFFVILLE	26.6	28.1	24.9	25.0	23.0	23.0	25.3	24.4	26.4	30.1
SUDBURY	29.5	28.9	27.2	27.0	25.4	25.9	27.1	29.7	28.1	28.0
TIVERTON	34.6	33.1	31.3	34.2	33.4	32.2	31.7	31.6	32.0	32.5
TORONTO	17.5	16.9	15.7	18.0	12.5	14.6	16.9	16.6	12.2	13.7
WINDSOR	23.5	20.6	17.1	17.6	15.1	17.1	18.0	18.3	20.4	20.7
COMPOSITE MEAN	24.4	23.4	21.8	24.3	21.2	23.1	23.9	23.4	23.4	24.1

\* Site changed location from Edna/Frederick St (26029) to West Ave/Homewood (26060) in 1990.

# Site change from King/Rectory (15001) to 900 Highway Ave (15025) in 1995

n/a - data not available

**Table A38 Stations Used in Gaseous Trends**

City	Station# (Sampling Period)
Burlington	44008 (1988 - 1997)
Cornwall	56051 (1988 - 1997)
Etobicoke	35003 (1988 - 1997)
Fort Frances	62030 (1988 - 1997)
Hamilton	29000 (1988 - 1997)
Grand Bend	10001 (1988 - 1990);15020 (1991-1997)
Kitchener	26029 (1988 - 1990);26060 (1991-1997)
London	15001 (1988 - 1995);15025 (1996 - 1997)
Long Point	22901 (1988 - 1997)
Mandaumin	14118 (1988 - 1997)
Merlin	13021 (1988 - 1997)
Mississauga	46110 (1988 - 1997)
Niagara Falls	27056 (1988 - 1992);27072 (1993-1997)
North Bay	75010 (1988 - 1997)
North York	34002 (1988 - 1991);34020 (1992-1997)
Oakville	44015 (1988 - 1997)
Oshawa	45025 (1988 - 1997)
Ottawa	51001 (1988 - 1997)
Peterborough	59006 (1988 - 1997)
Sarnia	14064 (1988 - 1997)
Scarborough	33003 (1988 - 1997)
Simcoe	22071 (1988 - 1997)
St Catharines	27067 (1988 - 1997)
Stouffville	48002 (1988 - 1997)
Sudbury	77203 (1988 - 1997)
Thunder Bay	63200 (1988 - 1997)
Tiverton	18007 (1988 - 1997)
Toronto	31104 (1988 - 1990);31103 (1991-1997)
Windsor	12008 (1988 - 1997)



TABLE 39 VOC Annual Statistics at Egbert (1997)

Unit = micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	%Samples >IDL	P E R C E N T I L E S							Std Dev	
				% Max	5%	25%	75%	90%	Max	Min	Median	Mean
Ethane	Alkane	155	100.00	14.400	0.89	1.24	2.93	4.15	9.24	0.76	1.83	2.30
Propanol	Alkane	155	100.00	12.323	1.39	1.48	1.65	1.73	1.88	1.20	1.57	1.57
Chloroethane	Halogen	155	100.00	7.457	0.77	0.95	1.04	1.18	1.34	0.69	0.97	0.97
Freon11	Halogen	155	100.00	6.251	0.11	0.14	1.69	2.68	43.85	0.00	0.73	1.46
Propane	Alkane	155	99.35	4.665	0.54	0.57	0.61	0.63	0.69	0.52	0.59	0.59
Carbon tetrachloride	Halogen	155	100.00	4.272	0.49	0.52	0.57	0.61	0.76	0.46	0.55	0.55
1,1,1-Trichloroethane	Halogen	155	100.00	4.077	0.17	0.30	1.06	1.53	3.74	0.12	0.90	0.75
Acetylene	Alkyne	155	100.00	4.069	0.15	0.24	0.92	1.84	18.88	0.09	0.40	0.84
Toluene	Aromatic	155	100.00	3.724	0.09	0.19	1.04	2.01	5.84	0.05	0.40	0.82
Benzene	Alkane	155	100.00	3.672	0.00	0.04	0.57	1.22	3.97	0.00	0.17	0.42
Isoprene	Alkene	155	99.68	3.442	0.10	0.20	0.95	1.75	5.88	0.08	0.38	0.73
Isopentane	Alkane	155	100.00	3.209	0.23	0.30	0.60	1.07	3.76	0.18	0.37	0.55
Ethylene	Alkene	155	100.00	3.165	0.32	0.37	0.45	0.52	1.03	0.26	0.41	0.42
Freon22	Halogen	155	100.00	2.488	0.11	0.18	0.64	0.95	2.98	0.08	0.32	0.46
Butane	Aromatic	155	99.35	2.236	0.09	0.16	0.56	0.98	3.26	0.00	0.26	0.45
Pentane	Alkane	155	100.00	1.827	0.14	0.17	0.29	0.54	4.10	0.12	0.21	0.32
Dichloromethane	Halogen	155	99.35	1.804	0.04	0.09	0.55	1.01	2.68	0.00	0.19	0.39
Isobutane	Alkane	155	100.00	1.660	0.05	0.07	0.33	1.11	8.94	0.03	0.11	0.43
m and p-Xylene	Aromatic	155	100.00	0.880	0.00	0.06	0.22	0.42	1.48	0.00	0.10	0.18
2-Methylpentane	Alkane	155	92.90	0.862	0.03	0.04	0.20	0.46	3.19	0.02	0.08	0.20
Ethylbenzene	Aromatic	155	100.00	0.785	0.03	0.05	0.19	0.38	1.28	0.00	0.08	0.16
Hexane	Alkane	155	99.35	0.762	0.07	0.08	0.13	0.19	0.51	0.00	0.10	0.12
1-Butene/Isobutene	Alkene	155	97.42	0.750	0.04	0.06	0.15	0.30	1.04	0.00	0.09	0.14
Propylene	Alkene	155	100.00	0.709	0.08	0.08	0.10	0.11	0.19	0.07	0.09	0.09
Chloroform	Halogen	155	100.00	0.685	0.02	0.04	0.17	0.40	1.63	0.00	0.08	0.15
3-Methylpentane	Alkane	155	96.13	0.602	0.02	0.05	0.13	0.26	2.78	0.00	0.07	0.13
Heptane	Alkane	154	94.81	0.590	0.02	0.03	0.12	0.30	2.46	0.01	0.05	0.14
o-Xylene	Aromatic	155	100.00	0.565	0.02	0.04	0.15	0.26	1.32	0.00	0.06	0.11
2,2,4-Trimethylpentane	Alkane	155	98.06	0.416	0.02	0.03	0.08	0.15	1.35	0.00	0.04	0.08
Trichloroethylene	Halogen	155	99.35	0.380	0.02	0.03	0.06	0.11	0.49	0.01	0.04	0.06
Naphthalene	Aromatic	155	100.00	0.378	0.02	0.02	0.07	0.21	1.10	0.01	0.03	0.08
1,2,4-Trimethylbenzene	Aromatic	155	100.00	0.361	0.02	0.03	0.07	0.11	0.55	0.00	0.04	0.06
Undecane	Alkane	155	95.48	0.315	0.00	0.03	0.07	0.14	0.82	0.00	0.04	0.07
Decane	Alkane	155	87.74	0.329	0.00	0.00	0.10	0.22	1.06	0.00	0.04	0.08
3-Methylhexane	Alkane	155	65.81	0.324	0.00	0.03	0.07	0.13	0.91	0.00	0.04	0.07
Octane	Alkane	155	81.29	0.315	0.00	0.00	0.10	0.21	0.91	0.00	0.04	0.07
2-Methylhexane	Alkane	155	67.10	0.270	0.00	0.02	0.07	0.14	0.49	0.00	0.03	0.06
Methylcyclopentane	Alkane	155	78.06	0.270	0.00	0.02	0.07	0.14	0.49	0.00	0.03	0.06
Dodecane	Alkane	155	80.00	0.270	0.00	0.03	0.05	0.08	0.28	0.00	0.04	0.04
3-Ethylhexane	Aromatic	155	98.71	0.266	0.01	0.02	0.06	0.14	0.80	0.00	0.02	0.06
Nonane	Alkane	155	70.32	0.261	0.00	0.00	0.07	0.11	0.71	0.00	0.04	0.08
2,2-Dimethylbutane	Alkane	155	91.61	0.248	0.00	0.02	0.06	0.08	0.27	0.00	0.03	0.04
2,3-Dimethylbutane	Alkane	155	63.87	0.214	0.00	0.00	0.06	0.15	0.51	0.00	0.03	0.05
Styrene	Aromatic	155	83.23	0.213	0.00	0.02	0.03	0.08	0.96	0.00	0.02	0.04
4-Ethylhexane	Aromatic	155	97.42	0.187	0.01	0.01	0.04	0.08	0.43	0.00	0.02	0.04
n-Propylbenzene	Aromatic	155	96.77	0.173	0.01	0.01	0.04	0.07	0.36	0.00	0.02	0.03
Cyclopentane	Alkane	155	61.29	0.169	0.00	0.00	0.05	0.10	0.30	0.00	0.03	0.04
2,3-Dimethylpentane	Alkane	155	58.06	0.168	0.00	0.00	0.06	0.11	0.44	0.00	0.03	0.04
1,4-Dichlorobenzene	Halogen	155	99.35	0.162	0.01	0.02	0.03	0.05	0.15	0.00	0.02	0.03

TABLE 39 VOC Annual Statistics at Egbert (1997)

Unit =micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	%Samples >IDL	PERCENTILES					Min	Median	Mean	Std Dev.
				% Max	5%	25%	75%	90%				
				0.95	0.01	0.01	0.01	0.01	0.00	0.02	0.03	0.04
Methylchloride	Aromatic	155	34.84	0.15	0.00	0.00	0.05	0.11	0.00	0.02	0.04	0.11
Methylcyclohexane	Alkane	155	61.29	0.156	0.00	0.00	0.05	0.11	0.00	0.02	0.04	0.07
2,3,4-Trimethylpentane	Alkane	155	49.68	0.155	0.00	0.00	0.06	0.12	0.55	0.00	0.00	0.04
Cyclohexane	Alkane	155	47.74	0.151	0.00	0.00	0.06	0.10	0.26	0.00	0.00	0.04
2-Methylheptane	Alkane	155	45.81	0.139	0.00	0.00	0.05	0.10	0.79	0.00	0.00	0.04
1,4-Dimethylbenzene	Aromatic	155	73.55	0.137	0.00	0.00	0.03	0.06	0.21	0.00	0.02	0.03
1-Hexene	Alkene	155	42.58	0.123	0.00	0.00	0.05	0.06	0.11	0.00	0.00	0.02
1,2,3-Trimethylbenzene	Aromatic	155	82.58	0.123	0.00	0.01	0.02	0.06	0.29	0.00	0.01	0.02
1,3,5-Trimethylbenzene	Aromatic	155	77.42	0.111	0.00	0.01	0.02	0.06	0.31	0.00	0.01	0.02
3-Methylpentane	Alkane	155	41.94	0.109	0.00	0.00	0.05	0.09	0.67	0.00	0.00	0.03
1-Pentene	Alkene	155	39.35	0.103	0.00	0.00	0.04	0.07	0.14	0.00	0.00	0.02
2,4-Dimethylpentane	Alkane	155	46.45	0.094	0.00	0.00	0.04	0.07	0.22	0.00	0.00	0.02
iso-Propylbenzene	Aromatic	155	78.06	0.080	0.00	0.01	0.02	0.03	0.11	0.00	0.01	0.01
Indane	Aromatic	155	72.26	0.077	0.00	0.00	0.02	0.03	0.14	0.00	0.01	0.02
p-Cymene	Aromatic	155	33.55	0.072	0.00	0.00	0.02	0.04	0.11	0.00	0.00	0.01
2,4-Dimethylhexane	Alkane	155	37.42	0.069	0.00	0.00	0.03	0.06	0.43	0.00	0.00	0.02
2,4-Dimethylheptane	Alkane	155	40.65	0.062	0.00	0.00	0.03	0.05	0.36	0.00	0.00	0.02
2-Methyl-1-butene	Alkene	155	38.71	0.057	0.00	0.00	0.03	0.04	0.17	0.00	0.00	0.01
n-Butylbenzene	Aromatic	155	57.42	0.054	0.00	0.00	0.02	0.02	0.07	0.00	0.01	0.01
cis-1,3-Dimethylcyclohexane	Alkene	155	37.42	0.049	0.00	0.00	0.02	0.05	0.44	0.00	0.00	0.02
1,3-Butadiene	Alkene	155	29.03	0.047	0.00	0.00	0.02	0.04	0.14	0.00	0.00	0.01
2-Methyl-2-butene	Alkene	155	30.97	0.045	0.00	0.00	0.02	0.03	0.17	0.00	0.00	0.01
cis-1,2-Dimethylcyclohexane	Alkane	155	41.94	0.039	0.00	0.00	0.02	0.02	0.08	0.00	0.00	0.01
2,2,5-Trimethylhexane	Alkene	155	36.77	0.037	0.00	0.00	0.02	0.03	0.16	0.00	0.00	0.01
4-Methylpentane	Alkane	155	27.10	0.034	0.00	0.00	0.01	0.04	0.26	0.00	0.00	0.01
cis-2-Pentene	Alkene	155	28.39	0.032	0.00	0.00	0.01	0.03	0.08	0.00	0.00	0.01
trans-1,4-Dimethylcyclohexane	Alkane	155	26.45	0.031	0.00	0.00	0.01	0.03	0.29	0.00	0.00	0.01
4-Methyl-1-pentene	Aromatic	155	39.35	0.029	0.00	0.00	0.01	0.02	0.08	0.00	0.00	0.01
trans-2-Pentene	Alkene	155	22.58	0.022	0.00	0.00	0.00	0.02	0.13	0.00	0.00	0.01
Cyclopentene	Alkene	155	30.32	0.022	0.00	0.00	0.01	0.01	0.04	0.00	0.00	0.01
2,2-Dimethylpentane	Alkane	155	23.87	0.021	0.00	0.00	0.00	0.02	0.06	0.00	0.00	0.01
cis-2-Butene	Alkene	155	17.42	0.019	0.00	0.00	0.00	0.02	0.09	0.00	0.00	0.01
trans-1,4-Dimethylcyclohexane	Alkane	155	23.23	0.018	0.00	0.00	0.00	0.02	0.18	0.00	0.00	0.01
cis-1,4,6,1,3-Dimethylcyclohexane	Alkane	155	29.68	0.018	0.00	0.00	0.01	0.02	0.13	0.00	0.00	0.01
trans-2-Butene	Alkene	155	16.77	0.016	0.00	0.00	0.00	0.02	0.09	0.00	0.00	0.01
4-Methyl-1-pentene	Alkene	155	2.58	0.002	0.00	0.00	0.00	0.00	0.04	0.00	0.00	0.00
2,2-Dimethylhexane	Alkene	155	4.52	0.002	0.00	0.00	0.00	0.00	0.02	0.00	0.00	0.00
trans-2-Hexene	Alkene	155	1.94	0.001	0.00	0.00	0.00	0.00	0.03	0.00	0.00	0.00
cis-2-Hexene	Alkene	155	1.29	0.001	0.00	0.00	0.00	0.00	0.05	0.00	0.00	0.00
cis-3-Methyl-2-pentene	Alkene	155	1.84	0.001	0.00	0.00	0.00	0.00	0.03	0.00	0.00	0.00
3-Methyl-1-pentene	Alkene	155	1.94	0.001	0.00	0.00	0.00	0.00	0.02	0.00	0.00	0.00
trans-3-Methyl-2-pentene	Alkene	155	0.65	0.001	0.00	0.00	0.00	0.00	0.09	0.00	0.00	0.01
cis-4-Methyl-2-pentene	Alkene	155	1.29	0.001	0.00	0.00	0.00	0.00	0.02	0.00	0.00	0.00

TABLE 40 VOC Annual Statistics at Etobicoke South (1997)

Unit = micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Samples >DL	% Average Mass	PERCENTILES							Std. Dev.	
					5%	25%	75%	95%	Min.	Max.	Median		Mean
Toluene	Aromatic	56	100.00	8.392	2.17	4.74	11.07	40.37	1.06	58.18	7.13	11.67	12.61
Xylene	Alkane	56	100.00	6.973	1.44	3.08	11.92	37.91	0.67	66.18	5.91	10.77	14.60
Propane	Alkane	56	100.00	6.546	2.81	4.86	9.71	17.57	1.27	37.22	6.89	8.32	6.29
Dichloromethane	Halogen	56	100.00	5.744	0.89	1.54	9.53	38.51	0.39	44.72	3.07	8.15	11.18
Isopentane	Alkane	56	100.00	5.373	1.58	2.80	8.76	27.23	1.31	46.40	4.86	8.13	9.93
Ethane	Alkane	56	100.00	5.135	2.48	3.73	6.93	11.06	1.63	17.67	5.25	5.81	3.08
m and p-Xylene	Aromatic	56	100.00	4.955	1.21	2.86	6.80	17.49	0.90	36.72	5.00	6.64	7.09
Acetylene	Alkyne	56	100.00	4.452	1.25	2.79	7.32	12.15	0.85	24.16	4.37	5.44	4.17
Isobutane	Alkane	56	100.00	4.332	0.63	2.43	6.44	17.96	0.30	42.07	4.27	5.88	7.30
Butylene	Alkene	56	100.00	3.680	0.96	2.11	5.72	9.70	0.58	29.19	3.69	4.68	4.45
Freon12	Halogen	56	100.00	3.445	2.48	2.75	3.53	5.36	2.38	7.02	2.99	3.36	1.00
Pentane	Alkane	56	100.00	3.049	1.03	1.74	5.10	12.18	0.77	24.54	3.29	4.43	4.69
2-Methylpentane	Alkane	56	100.00	2.046	0.71	1.32	2.91	6.82	0.52	14.99	1.89	2.70	2.59
Benzene	Aromatic	56	100.00	1.864	0.68	1.37	2.87	4.64	0.55	10.54	1.89	2.36	1.82
Freon11	Halogen	53	100.00	1.836	1.59	1.71	1.94	2.29	1.52	2.82	1.80	1.86	0.26
Biphenylene	Aromatic	56	100.00	1.474	0.42	0.92	2.07	5.59	0.31	11.17	1.48	1.96	2.00
Hexane	Alkane	56	100.00	1.346	0.43	0.81	2.08	3.55	0.19	11.41	1.44	1.81	1.74
Propylene	Alkene	56	100.00	1.321	0.36	0.84	1.80	5.09	0.26	10.53	1.25	1.84	2.00
o-Xylene	Aromatic	56	100.00	1.123	0.87	0.96	1.10	1.20	0.81	1.40	1.03	1.03	0.11
Chloromethane	Halogen	56	100.00	1.087	0.37	0.67	1.76	3.90	0.26	10.37	1.12	1.57	1.70
3-Methylpentane	Alkane	56	100.00	1.074	0.29	0.68	1.83	4.34	0.20	10.00	1.01	1.53	1.65
1,2,4-Trinitrobenzene	Aromatic	56	100.00	1.022	0.41	0.66	1.49	3.43	0.38	6.75	1.06	1.34	1.21
1-Butene/isobutene	Alkene	56	100.00	0.830	0.48	0.57	0.98	2.05	0.37	4.30	0.74	0.95	0.68
Freon22	Halogen	56	100.00	0.831	0.18	0.46	1.23	2.52	0.15	8.07	0.76	1.09	1.21
3-Methylhexane	Alkane	56	100.00	0.793	0.19	0.44	1.12	2.63	0.14	14.23	0.68	1.16	1.96
Heptane	Alkane	56	100.00	0.745	0.60	0.64	0.71	0.78	0.50	0.82	0.68	0.66	0.06
Carbon tetrachloride	Halogen	56	100.00	0.744	0.26	0.51	1.11	2.43	0.17	5.57	0.74	1.02	1.02
2,2,4-Trinitrophenol	Alkane	56	100.00	0.726	0.22	0.44	1.09	2.49	0.17	4.62	0.71	0.93	0.82
Tetraethoxyethylene	Halogen	56	100.00	0.706	0.16	0.41	1.15	2.17	0.08	8.95	0.69	1.03	1.31
2-Methylhexane	Alkane	56	100.00	0.647	0.46	0.54	0.68	0.89	0.44	1.13	0.58	0.62	0.15
1,1,1-Trichloroethane	Halogen	56	100.00	0.653	0.18	0.36	0.90	3.54	0.15	8.78	0.65	0.99	1.35
Decane	Alkane	56	100.00	0.643	0.18	0.40	1.04	2.55	0.12	6.02	0.62	0.92	1.01
3-Ethyltoluene	Aromatic	56	100.00	0.626	0.18	0.33	0.94	2.49	0.13	11.12	0.55	1.01	1.73
Methylcyclopentane	Alkane	56	100.00	0.628	0.13	0.25	1.07	2.02	0.04	3.64	0.56	0.79	0.76
Naphthalene	Aromatic	56	100.00	0.556	0.00	0.14	0.83	3.57	0.00	8.23	0.35	0.88	1.50
Styrene	Aromatic	52	86.54	0.499	0.13	0.28	0.76	2.25	0.06	5.62	0.47	0.72	0.88
Undecane	Alkane	56	100.00	0.473	0.16	0.22	0.84	2.57	0.12	5.71	0.41	0.73	0.99
2-Methyl-2-butene	Alkene	56	100.00	0.466	0.12	0.28	0.76	1.26	0.09	3.24	0.43	0.58	0.52
2,3-Dimethylpentane	Alkane	56	100.00	0.453	0.16	0.28	0.72	1.57	0.10	3.97	0.42	0.64	0.68
2,3-Dimethylbutane	Alkane	53	100.00	0.419	0.14	0.22	0.64	2.32	0.08	7.05	0.38	0.68	1.06
Trichloroethylene	Halogen	53	100.00	0.393	0.10	0.20	0.46	2.54	0.06	11.96	0.29	0.70	1.69
Octane	Alkane	56	100.00	0.389	0.12	0.22	0.49	1.87	0.10	8.30	0.38	0.61	1.13
Nonane	Alkane	56	100.00	0.371	0.10	0.22	0.49	2.35	0.05	5.88	0.36	0.58	0.93
3-Methylheptane	Alkane	56	100.00										

TABLE 40 VOC Annual Statistics at Etobicoke South (1997)

Unit = micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Samples >DL	% Average Mass	PERCENTILES							Mean	Std. Dev.
					5%	25%	75%	95%	Min.	Max.	Median		
Methylcyclohexane	Alkane	56	100.00	0.371	0.11	0.20	0.53	0.99	0.10	15.06	0.33	0.69	2.00
1,3,5-Trimethylbenzene	Aromatic	56	100.00	0.363	0.10	0.23	0.59	1.40	0.08	3.40	0.34	0.52	0.56
Cyclopentane	Alkane	56	100.00	0.318	0.11	0.18	0.53	1.27	0.10	2.53	0.28	0.45	0.46
4-Ethyltoluene	Aromatic	56	100.00	0.317	0.10	0.20	0.50	1.20	0.08	2.55	0.31	0.44	0.44
2-Methylheptane	Alkane	54	85.19	0.292	0.00	0.12	0.42	1.18	0.00	6.28	0.26	0.44	0.89
2,3,4-Trimethylpentane	Alkane	56	100.00	0.296	0.11	0.19	0.47	1.15	0.05	2.59	0.30	0.41	0.44
1,4-Diethylbenzene	Aromatic	56	100.00	0.288	0.08	0.16	0.49	1.18	0.04	2.62	0.24	0.41	0.44
1,2,3-Trimethylbenzene	Aromatic	56	100.00	0.265	0.08	0.18	0.45	1.09	0.06	2.55	0.25	0.38	0.41
2-Ethyltoluene	Aromatic	56	100.00	0.262	0.08	0.16	0.42	0.98	0.06	2.16	0.27	0.36	0.36
cis-2-Pentene	Alkene	56	100.00	0.255	0.07	0.12	0.39	1.31	0.04	3.08	0.21	0.39	0.53
1,3-Butadiene	Alkene	56	100.00	0.250	0.06	0.14	0.40	0.70	0.04	2.19	0.24	0.33	0.33
trans-2-Butene	Alkene	56	100.00	0.245	0.07	0.14	0.42	0.97	0.03	2.12	0.22	0.35	0.38
cis-2-Butene	Alkene	56	100.00	0.243	0.07	0.14	0.42	1.07	0.06	2.14	0.22	0.35	0.40
1-Pentene	Alkene	56	100.00	0.238	0.10	0.14	0.36	0.82	0.04	1.87	0.22	0.32	0.33
Dodecane	Alkane	56	100.00	0.235	0.06	0.14	0.34	0.70	0.04	1.61	0.20	0.29	0.26
2,2-Dimethylbutane	Alkane	56	100.00	0.231	0.10	0.14	0.37	0.72	0.07	1.78	0.24	0.31	0.29
1-Hexene	Alkene	56	92.86	0.233	0.00	0.15	0.35	0.66	0.00	1.97	0.24	0.30	0.31
Cyclohexane	Alkane	56	100.00	0.218	0.08	0.14	0.32	0.72	0.05	4.23	0.22	0.32	0.56
n-Propylbenzene	Aromatic	56	100.00	0.211	0.07	0.15	0.34	0.78	0.06	1.68	0.22	0.29	0.28
2,4-Dimethylpentane	Alkane	56	100.00	0.206	0.06	0.14	0.33	0.61	0.05	1.99	0.20	0.29	0.31
Isoprene	Alkene	54	100.00	0.194	0.06	0.12	0.26	0.71	0.06	1.17	0.19	0.25	0.23
Freon114	Halogen	56	100.00	0.194	0.11	0.12	0.22	0.26	0.10	0.27	0.17	0.18	0.05
cis-1,3-Dimethylcyclo	Alkane	56	100.00	0.191	0.04	0.09	0.25	1.25	0.03	4.58	0.14	0.32	0.68
trans-2-Pentene	Alkene	56	100.00	0.179	0.04	0.10	0.29	0.71	0.02	1.06	0.17	0.24	0.22
2,4-Dimethylhexane	Alkane	56	100.00	0.172	0.06	0.11	0.26	0.56	0.04	2.19	0.16	0.24	0.32
1,4-Dichlorobenzene	Halogen	56	100.00	0.159	0.04	0.10	0.25	0.57	0.04	1.15	0.14	0.21	0.22
2-Methyl-1-butene	Alkene	56	100.00	0.160	0.03	0.06	0.25	0.46	0.02	0.58	0.16	0.18	0.14
Chloroform	Halogen	56	100.00	0.157	0.08	0.12	0.18	0.35	0.05	0.49	0.14	0.17	0.09
Bromomethane	Halogen	56	100.00	0.142	0.06	0.07	0.16	0.20	0.06	0.37	0.12	0.13	0.06
1,2-Dichloroethane	Halogen	56	98.21	0.138	0.03	0.06	0.10	0.55	0.00	2.92	0.08	0.17	0.41
2,5-Dimethylhexane	Alkane	56	100.00	0.137	0.05	0.08	0.20	0.49	0.02	1.37	0.14	0.19	0.21
1-Decene	Alkene	51	11.76	0.137	0.00	0.00	0.00	0.97	0.00	4.02	0.00	0.16	0.65
4-Methylheptane	Alkane	54	87.04	0.120	0.00	0.06	0.17	0.78	0.00	3.18	0.12	0.21	0.45
Indane	Aromatic	56	100.00	0.118	0.04	0.07	0.19	0.40	0.02	0.88	0.12	0.16	0.15
trans-1,2-Dimethylcyclo	Alkene	56	91.07	0.115	0.00	0.05	0.15	0.84	0.00	2.51	0.08	0.19	0.39
p-Cymene	Aromatic	56	98.21	0.109	0.03	0.06	0.18	0.36	0.00	0.51	0.09	0.13	0.12
Chloroethane	Halogen	56	91.07	0.098	0.00	0.06	0.12	0.45	0.00	1.43	0.09	0.14	0.24
trans-2-Octene	Alkene	56	87.50	0.094	0.02	0.04	0.13	0.49	0.00	1.00	0.08	0.12	0.17
1-Methylcyclopentene	Alkene	56	100.00	0.085	0.02	0.04	0.14	0.34	0.01	0.87	0.08	0.13	0.15
iso-Propylbenzene	Aromatic	56	100.00	0.077	0.04	0.06	0.11	0.24	0.02	0.55	0.08	0.10	0.09
Cyclopentene	Alkene	56	100.00	0.073	0.02	0.04	0.10	0.25	0.01	0.57	0.08	0.10	0.10
Dibromomethane	Halogen	56	92.86	0.072	0.00	0.03	0.08	0.12	0.00	0.14	0.06	0.06	0.04
2,2-Dimethylhexane	Alkane	56	89.29	0.068	0.00	0.02	0.06	0.32	0.00	0.57	0.03	0.07	0.11
1,3-Diethylbenzene	Aromatic	56	100.00	0.066	0.02	0.04	0.10	0.23	0.02	0.51	0.06	0.09	0.09



TABLE 40 VOC Annual Statistics at Etobicoke South (1997)

Unit = micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Samples >DI	% Average Mass	PERCENTILES										Mean	Std. Dev.
					5%	25%	75%	95%	Min.	Max.	Median					
2,2-Dimethylpentane	Alkane	56	98.21	0.0557	0.02	0.04	0.10	0.15	0.00	0.64	0.06	0.08	0.09			
n-Butylbenzene	Aromatic	56	98.21	0.0556	0.02	0.04	0.09	0.23	0.00	0.49	0.05	0.08	0.08			
2,2-Dimethylpropane	Alkane	56	89.29	0.0555	0.00	0.03	0.08	0.16	0.00	0.25	0.06	0.07	0.05			
Cyclohexene	Alkene	51	98.04	0.0553	0.02	0.04	0.08	0.14	0.00	0.17	0.06	0.07	0.04			
trans-2-Hexene	Alkene	56	94.64	0.0551	0.01	0.04	0.08	0.22	0.00	0.43	0.05	0.07	0.08			
trans-1,4-Dimethylcyclohexane	Alkene	56	50.00	0.0499	0.00	0.00	0.07	0.67	0.00	1.67	0.01	0.11	0.30			
trans-4-Methyl-2-pentene	Alkene	56	21.43	0.0485	0.00	0.00	0.00	0.49	0.00	0.98	0.00	0.08	0.20			
1-Methylcyclohexene	Alkene	56	83.93	0.0466	0.00	0.02	0.08	0.14	0.00	0.31	0.06	0.06	0.06			
cis-3-Methyl-2-pentene	Alkene	56	83.93	0.0444	0.00	0.02	0.09	0.17	0.00	0.37	0.05	0.07	0.07			
3,6-Dimethylcyclohexane	Alkane	56	71.43	0.043	0.00	0.00	0.08	0.24	0.00	0.81	0.05	0.07	0.12			
1,1-Dichloroethylenes	Halogen	56	62.50	0.041	0.00	0.00	0.06	0.08	0.00	0.08	0.04	0.04	0.03			
cis-2-Octene	Alkene	56	25.00	0.041	0.00	0.00	0.01	0.31	0.00	0.78	0.00	0.05	0.13			
cis-1,4(+),3-Dimethylalkane	Alkane	56	62.50	0.040	0.00	0.00	0.06	0.34	0.00	0.95	0.03	0.07	0.15			
Bromofuran	Halogen	53	100.00	0.038	0.02	0.02	0.05	0.06	0.01	0.06	0.04	0.04	0.02			
sec-Butylbenzene	Aromatic	56	94.64	0.037	0.01	0.02	0.06	0.12	0.00	0.29	0.04	0.05	0.05			
cis-4-Methyl-2-pentene	Alkene	56	28.57	0.034	0.00	0.00	0.05	0.31	0.00	0.94	0.00	0.07	0.17			
Bromodichloromethane	Halogen	56	37.50	0.034	0.00	0.00	0.06	0.10	0.00	0.11	0.00	0.03	0.04			
Dibromochloromethane	Halogen	56	58.93	0.033	0.00	0.00	0.05	0.06	0.00	0.08	0.02	0.03	0.03			
1-Octene	Alkene	49	28.57	0.031	0.00	0.00	0.05	0.26	0.00	2.83	0.00	0.09	0.41			
2,2,5-Trimethylhexane	Alkane	56	42.86	0.029	0.00	0.00	0.04	0.17	0.00	0.67	0.00	0.05	0.11			
cis-2-Hexene	Alkene	56	71.43	0.029	0.00	0.00	0.06	0.13	0.00	0.24	0.04	0.04	0.05			
iso-Butylbenzene	Aromatic	56	98.21	0.028	0.01	0.02	0.04	0.08	0.00	0.18	0.03	0.04	0.03			
cis-1,2-Dichloroethyl	Halogen	56	62.50	0.029	0.00	0.00	0.05	0.08	0.00	0.15	0.04	0.03	0.03			
1,1-Dichloroethane	Halogen	56	67.86	0.027	0.00	0.00	0.04	0.06	0.00	0.09	0.03	0.03	0.02			
Benzylchloride	Halogen	53	54.72	0.025	0.00	0.00	0.05	0.16	0.00	0.39	0.03	0.04	0.07			
trans-3-Methyl-2-pentene	Alkene	56	50.00	0.026	0.00	0.00	0.08	0.16	0.00	0.30	0.01	0.05	0.07			
1,1,2,2-Tetrachloroethane	Halogen	56	46.43	0.025	0.00	0.00	0.04	0.06	0.00	0.09	0.00	0.02	0.03			
1,2-Diethylbenzene	Aromatic	56	83.93	0.023	0.00	0.01	0.04	0.08	0.00	0.14	0.02	0.03	0.03			
1-Stearic	Alkene	45	26.67	0.023	0.00	0.00	0.03	0.20	0.00	1.92	0.00	0.08	0.30			
EDB	Halogen	56	44.64	0.022	0.00	0.00	0.04	0.06	0.00	0.06	0.00	0.02	0.02			
3-Methyl-1-pentene	Alkene	56	35.71	0.021	0.00	0.00	0.04	0.13	0.00	0.32	0.00	0.03	0.06			
cis-2-Heptene	Alkene	56	28.57	0.020	0.00	0.00	0.05	0.16	0.00	0.25	0.00	0.03	0.06			
trans-1,2-Dichloroethane	Halogen	56	53.57	0.020	0.00	0.00	0.04	0.04	0.00	0.06	0.01	0.02	0.02			
1-Heptene	Alkene	53	5.66	0.019	0.00	0.00	0.00	0.05	0.00	0.40	0.00	0.01	0.06			
2-Ethyl-1-Butene	Alkene	56	50.00	0.014	0.00	0.00	0.03	0.12	0.00	0.23	0.00	0.03	0.05			
Ethylbenzene	Halogen	56	41.07	0.015	0.00	0.00	0.03	0.04	0.00	0.06	0.00	0.01	0.02			
4-Methyl-1-pentene	Alkene	56	25.00	0.014	0.00	0.00	0.01	0.11	0.00	0.26	0.00	0.02	0.05			
1,2-Dichloropropane	Halogen	56	28.57	0.014	0.00	0.00	0.02	0.06	0.00	0.06	0.00	0.01	0.02			
1,1,2-Trichloroethane	Halogen	56	19.64	0.013	0.00	0.00	0.00	0.06	0.00	0.07	0.00	0.01	0.02			
trans-2-Heptene	Alkene	56	41.07	0.009	0.00	0.00	0.02	0.07	0.00	0.15	0.00	0.02	0.03			
Vinylchloride	Halogen	56	28.57	0.007	0.00	0.00	0.01	0.03	0.00	0.04	0.00	0.01	0.01			
2,2,3-Trimethylbutane	Alkane	56	30.36	0.006	0.00	0.00	0.02	0.04	0.00	0.20	0.00	0.01	0.03			
tert-Butylbenzene	Aromatic	56	25.00	0.004	0.00	0.00	0.00	0.03	0.00	0.06	0.00	0.01	0.01			
cis-3-Heptene	Alkene	53	3.77	0.004	0.00	0.00	0.00	0.00	0.00	1.09	0.00	0.02	0.15			

TABLE 40 VOC Annual Statistics at Eolihoko South (1997)

Unit =micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Samples >DL	% Average Mass	PERCENTILES								
					5%	25%	75%	95%	Min.	Max.	Median	Mean	Std. Dev.
1,1-Dichloroethene	Alkyne	56	8.93	0.002	0.00	0.00	0.00	0.01	0.00	0.01	0.00	0.00	0.00
trans-1,2-Heptene	Alkyne	55	12.73	0.000	0.00	0.00	0.00	0.00	0.00	0.01	0.00	0.00	0.00
trans-1,3-Dichloropro	Halogen	56	1.79	0.000	0.00	0.00	0.00	0.00	0.00	0.02	0.00	0.00	0.00
cis-1,3-Dichloropropene	Halogen	56	1.79	0.000	0.00	0.00	0.00	0.00	0.00	0.01	0.00	0.00	0.00
Hexylbenzene	Aromatic	56	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Bromochloromethane	Halogen	56	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Chlorobenzene	Halogen	56	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,4-Dichlorobutane	Halogen	56	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,3-Dichlorobenzene	Halogen	56	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,2-Dichlorobenzene	Halogen	56	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,2,4-Trichlorobenzene	Halogen	56	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Hexachlorocyclopentadiene	Halogen	56	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

TABLE 41 VOC Annual Statistics at Hamilton Downtown (1997)

Unit =micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Samples >DL	PERCENTILE					Max.	Median	Mean	Std. Dev.
				5%	25%	75%	90%	95%				
Butane	Alkane	59	100.00	6.664	1.70	2.88	7.88	14.80	34.50	4.86	6.98	6.22
Toluene	Aromatic	59	100.00	6.400	1.72	2.85	8.19	16.53	39.92	4.88	7.22	6.98
Isopentane	Alkane	59	100.00	5.889	2.03	3.65	6.79	10.34	13.6	4.88	6.07	4.34
Butane	Alkane	59	100.00	5.681	2.22	3.12	6.62	8.90	20.7	16.53	4.51	2.80
Propane	Alkane	59	100.00	5.340	1.79	2.49	5.52	8.42	11.0	28.60	4.24	5.18
Acetylene	Alkyne	59	100.00	4.231	1.91	2.41	4.43	6.57	1.51	10.56	3.54	3.91
Hexane	Alkane	59	100.00	4.127	0.47	0.84	6.62	20.88	0.29	71.68	1.16	6.67
Front12	Halogen	59	100.00	3.821	2.50	2.77	3.16	3.57	2.28	5.36	3.06	0.57
m and p-Xylene	Aromatic	59	100.00	3.652	1.03	1.62	5.29	9.20	0.52	14.64	3.02	4.10
Ethylene	Alkene	59	100.00	3.365	1.18	1.97	3.92	5.19	0.76	7.86	2.76	3.14
Pentane	Alkane	59	100.00	3.244	1.21	2.03	3.65	5.57	0.93	11.64	2.70	3.25
Isobutane	Alkane	59	100.00	2.960	0.92	1.32	3.52	6.62	0.80	12.49	2.36	3.16
2-Methylpentane	Alkane	59	100.00	2.954	0.77	1.59	3.63	6.23	0.58	11.22	2.28	3.06
Dichloromethane	Halogen	59	100.00	2.705	0.93	1.54	2.87	3.64	0.78	7.20	2.10	2.33
Benzene	Aromatic	59	100.00	2.590	0.75	1.18	3.93	6.59	0.61	14.18	1.72	2.94
Naphthalene	Aromatic	59	100.00	2.528	0.16	0.50	3.85	9.12	0.07	34.66	0.90	3.58
3-Methylpentane	Alkane	59	100.00	2.288	0.45	0.80	3.26	8.57	0.25	22.62	1.15	3.19
Front11	Halogen	53	100.00	2.167	1.68	1.79	1.93	2.02	1.52	2.24	1.84	0.15
Chloromethane	Halogen	59	100.00	1.378	0.87	0.98	1.14	1.20	0.81	1.24	1.04	0.10
Propylene	Alkene	59	100.00	1.349	0.50	0.82	1.44	2.36	0.36	4.47	1.14	1.32
1-Butene/Isobutene	Alkene	59	100.00	1.202	0.52	0.70	1.34	1.98	0.32	4.42	0.99	1.15
Ethylbenzene	Aromatic	59	100.00	1.191	0.37	0.63	1.68	2.69	0.18	4.05	0.94	1.27
1,2,4-Trimethylbenzene	Aromatic	59	100.00	1.152	0.36	0.68	1.45	2.15	0.17	3.86	0.94	1.16
o-Xylene	Aromatic	59	100.00	1.102	0.37	0.55	1.42	2.46	0.18	4.05	0.94	1.18
Methylcyclopentane	Alkane	59	100.00	0.909	0.20	0.35	1.15	2.93	0.13	11.40	0.48	1.23
Carbon tetrachloride	Halogen	59	100.00	0.891	0.60	0.66	0.72	0.74	0.60	0.84	0.68	0.05
2,2,4-Trimethylpentane	Alkane	59	100.00	0.894	0.32	0.53	0.99	1.32	0.19	2.92	0.76	0.86
1,1,1-Trichloroethane	Halogen	59	100.00	0.827	0.50	0.60	0.70	0.78	0.46	1.78	0.64	0.67
Front22	Halogen	59	100.00	0.780	0.41	0.47	0.69	0.97	0.36	2.19	0.54	0.36
Tetrachloroethylene	Halogen	59	100.00	0.763	0.17	0.32	0.97	1.80	0.14	3.96	0.55	0.78
3-Methylhexane	Alkane	59	100.00	0.754	0.24	0.40	0.93	1.38	0.16	2.42	0.64	0.76
2-Methylhexane	Alkane	59	100.00	0.693	0.17	0.38	0.92	1.39	0.14	2.56	0.58	0.72
3-Ethylhexene	Aromatic	59	100.00	0.688	0.20	0.40	0.83	1.27	0.11	2.47	0.55	0.70
Heptane	Alkane	59	100.00	0.622	0.22	0.33	0.81	1.28	0.14	2.74	0.46	0.66
2,3-Dimethylpentane	Alkane	59	100.00	0.596	0.18	0.30	0.69	1.12	0.11	1.93	0.44	0.56
2,3-Dimethylbutane	Alkane	59	100.00	0.562	0.17	0.33	0.62	1.19	0.10	2.01	0.44	0.58
2-Methyl-2-butene	Alkene	59	100.00	0.531	0.17	0.32	0.61	0.98	0.11	2.50	0.42	0.54
Undecane	Alkane	98	31	0.440	0.10	0.20	0.49	1.00	0.00	1.84	0.28	0.43
Decane	Alkane	59	100.00	0.409	0.12	0.22	0.50	0.87	0.06	1.50	0.32	0.43
1,3,5-Trimethylbenzene	Aromatic	59	100.00	0.392	0.11	0.22	0.46	0.80	0.06	1.28	0.34	0.40
Cyclopentane	Alkane	59	100.00	0.375	0.14	0.24	0.41	0.65	0.08	1.25	0.31	0.37
4-Ethyltoluene	Aromatic	59	100.00	0.347	0.12	0.21	0.41	0.59	0.06	1.05	0.30	0.21
3-Methylheptane	Alkane	59	100.00	0.341	0.12	0.20	0.40	0.70	0.06	1.09	0.28	0.34

TABLE 41 VOC Annual Statistics at Hamilton Downtown (1997)

Unit = micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Samples >DL	% Average Max	P E R C E N T I L E S						Max.	Median	Mean	Std. Dev.
					5%	25%	75%	90%	Min.					
Aromatic		59	100.00	0.127	0.10	0.20	0.39	0.63	0.01	1.03	0.26	0.33	0.22	
1,4-Diethylbenzene	Alkane	59	100.00	0.323	0.13	0.21	0.38	0.54	0.06	1.14	0.26	0.31	0.19	
2,3,4-Trimethylpentane	Alkane	59	100.00	0.321	0.07	0.14	0.44	0.67	0.06	2.92	0.22	0.35	0.43	
Cyclohexane	Alkane	59	100.00	0.314	0.10	0.16	0.38	0.74	0.07	1.22	0.24	0.33	0.26	
Nonane	Alkane	59	100.00	0.302	0.12	0.19	0.32	0.49	0.06	1.09	0.24	0.29	0.20	
2,2-Dimethylbutane	Alkane	59	100.00	0.294	0.08	0.15	0.41	0.74	0.06	1.32	0.22	0.32	0.27	
Methylcyclohexane	Alkane	59	98.31	0.295	0.09	0.16	0.34	0.63	0.00	1.00	0.23	0.30	0.23	
2-Methylheptane	Alkane	59	93.22	0.296	0.00	0.16	0.31	0.59	0.00	1.21	0.24	0.29	0.24	
1-Hexene	Alkene	59	100.00	0.289	0.09	0.16	0.34	0.48	0.04	0.85	0.26	0.28	0.17	
2-Ethylhexene	Aromatic	59	100.00	0.288	0.09	0.16	0.35	0.54	0.04	0.86	0.24	0.28	0.18	
1,2,3-Trimethylbenzene	Alkene	59	100.00	0.281	0.09	0.15	0.31	0.51	0.06	1.54	0.20	0.29	0.28	
cis-2-Pentene	Alkane	59	100.00	0.274	0.07	0.10	0.30	0.54	0.03	1.04	0.19	0.26	0.22	
Dodecane	Alkane	59	100.00	0.265	0.10	0.15	0.27	0.48	0.08	1.21	0.20	0.26	0.20	
1-Pentene	Alkene	59	100.00	0.266	0.08	0.14	0.32	0.62	0.05	1.10	0.20	0.29	0.25	
Octane	Alkane	59	100.00	0.266	0.00	0.08	0.33	0.73	0.00	2.81	0.18	0.30	0.43	
Styrene	Aromatic	53	90.57	0.266	0.08	0.15	0.33	0.54	0.06	1.31	0.20	0.27	0.21	
cis-2-Butene	Alkene	59	100.00	0.262	0.08	0.12	0.34	0.46	0.00	0.61	0.20	0.24	0.15	
Isoprene	Alkene	53	98.11	0.264	0.08	0.12	0.34	0.46	0.00	0.61	0.20	0.24	0.15	
2,4-Dimethylpentane	Alkane	59	100.00	0.250	0.10	0.15	0.28	0.43	0.05	0.80	0.22	0.25	0.15	
trans-2-Butene	Alkene	59	100.00	0.242	0.08	0.14	0.34	0.46	0.06	1.04	0.18	0.25	0.19	
Halogen		59	100.00	0.233	0.11	0.12	0.22	0.24	0.10	0.26	0.18	0.18	0.05	
Freon 114	Alkene	59	98.31	0.233	0.09	0.15	0.24	0.39	0.00	0.66	0.20	0.22	0.12	
1,3-Butadiene	Alkene	59	100.00	0.224	0.08	0.14	0.26	0.39	0.04	0.65	0.19	0.22	0.13	
n-Propylbenzene	Aromatic	59	100.00	0.201	0.08	0.11	0.21	0.34	0.06	0.79	0.15	0.19	0.14	
1,4-Dichlorobenzene	Halogen	59	100.00	0.186	0.04	0.07	0.26	0.31	0.02	0.50	0.14	0.17	0.12	
2-Methyl-1-butene	Alkene	59	100.00	0.185	0.06	0.10	0.25	0.30	0.03	0.47	0.14	0.18	0.11	
trans-2-Pentene	Alkene	59	100.00	0.173	0.06	0.11	0.19	0.31	0.03	0.63	0.14	0.17	0.11	
2,4-Dimethylhexane	Alkane	59	100.00	0.166	0.06	0.08	0.16	0.18	0.05	0.35	0.13	0.13	0.05	
Bromomethane	Halogen	59	100.00	0.166	0.07	0.10	0.24	0.40	0.04	1.04	0.12	0.19	0.18	
Trichloroethylene	Halogen	53	100.00	0.166	0.07	0.10	0.24	0.40	0.04	1.04	0.12	0.19	0.18	
p-Cymene	Aromatic	59	86.44	0.164	0.00	0.06	0.16	0.37	0.00	0.55	0.08	0.14	0.14	
Indane	Aromatic	59	100.00	0.148	0.05	0.09	0.16	0.27	0.02	0.46	0.12	0.15	0.09	
Chloroform	Halogen	59	100.00	0.146	0.08	0.10	0.14	0.16	0.06	0.21	0.12	0.12	0.03	
2,5-Dimethylhexane	Alkane	59	94.92	0.128	0.02	0.06	0.15	0.23	0.00	0.49	0.12	0.13	0.09	
Chloroethane	Halogen	59	93.22	0.112	0.00	0.06	0.12	0.13	0.00	0.20	0.09	0.09	0.04	
4-Methylheptane	Alkane	59	86.44	0.106	0.00	0.06	0.15	0.25	0.00	0.44	0.10	0.12	0.10	
cis-1,3-Dimethylcyclohexane	Alkene	59	94.92	0.102	0.02	0.04	0.16	0.26	0.00	0.68	0.08	0.12	0.14	
1-Methylcyclopentene	Alkene	59	100.00	0.096	0.03	0.06	0.11	0.17	0.02	0.37	0.08	0.09	0.06	
1-Heptene	Alkene	59	13.56	0.089	0.00	0.00	0.00	0.22	0.00	1.67	0.00	0.06	0.23	
Dichloromethane	Halogen	59	94.92	0.086	0.01	0.03	0.10	0.12	0.00	0.12	0.06	0.06	0.04	
trans-4-Methyl-2-pentene	Alkene	59	20.34	0.076	0.00	0.00	0.00	0.36	0.00	1.20	0.00	0.09	0.23	
Cyclopentene	Alkene	59	100.00	0.084	0.03	0.05	0.09	0.12	0.02	0.27	0.08	0.08	0.04	
2,2-Dimethylhexane	Alkene	59	84.75	0.085	0.00	0.02	0.06	0.12	0.00	1.01	0.04	0.08	0.16	
1-Decene	Alkene	53	7.55	0.085	0.00	0.00	0.00	0.00	0.00	1.03	0.00	0.06	0.22	
iso-Propylbenzene	Aromatic	59	100.00	0.083	0.03	0.06	0.10	0.14	0.01	0.22	0.07	0.08	0.05	
1,2-Dichloroethane	Halogen	59	100.00	0.081	0.04	0.05	0.08	0.10	0.02	0.14	0.06	0.06	0.02	



TABLE 41 VOC Annual Statistics at Hamilton Downtown (1997)

Unit = micrograms/m<sup>3</sup>

## P E R C E N T I L E S

Compounds	Compound Class	No. of Samples	% Samples >DL	% Average Mass	5%	25%	75%	90%	Min.	Max.	Median	Mean	Std. Dev.
2,2-Dimethylpentane	Alkane	59	98.31	0.076	0.03	0.04	0.08	0.13	0.00	0.23	0.06	0.07	0.05
1,3-Diethylbenzene	Aromatic	59	100.00	0.075	0.02	0.04	0.08	0.13	0.01	0.21	0.06	0.07	0.04
Alkene		55	96.36	0.063	0.01	0.04	0.08	0.10	0.00	0.16	0.05	0.06	0.03
Cyclohexene	Alkene	59	94.92	0.062	0.02	0.04	0.07	0.10	0.00	0.18	0.06	0.06	0.04
n-Butylbenzene	Aromatic	59	98.14	0.061	0.00	0.04	0.08	0.11	0.00	0.19	0.06	0.06	0.04
cis-3-Methyl-2-pentene	Alkene	59	32.20	0.059	0.00	0.00	0.08	0.24	0.00	0.67	0.00	0.08	0.15
cis-4-Methyl-2-pentene	Alkene	59	83.05	0.060	0.00	0.04	0.08	0.11	0.00	0.23	0.06	0.06	0.04
1-Methylcyclohexene	Alkene	59	100.00	0.058	0.02	0.04	0.06	0.09	0.01	0.16	0.04	0.05	0.03
trans-2-Heptene	Alkene	59	100.00	0.057	0.00	0.02	0.08	0.25	0.00	0.55	0.00	0.07	0.13
2,2-Dimethylpentane	Alkene	59	93.22	0.054	0.00	0.00	0.10	0.25	0.00	0.33	0.04	0.07	0.08
1-Octene	Alkene	54	33.33	0.054	0.00	0.00	0.10	0.16	0.00	0.42	0.04	0.07	0.09
trans-2-Octene	Alkene	59	67.80	0.054	0.00	0.00	0.09	0.17	0.00	0.42	0.04	0.07	0.09
trans-1,2-Dimethylcyclohexane	Alkane	59	67.80	0.050	0.00	0.00	0.06	0.08	0.00	0.10	0.04	0.04	0.03
1,1-Dichloroethane	Halogen	59	61.02	0.050	0.00	0.00	0.06	0.08	0.00	0.08	0.04	0.04	0.04
Bromodrom	Halogen	53	98.11	0.044	0.02	0.02	0.05	0.06	0.00	0.14	0.00	0.03	0.03
Bromodichloromethane	Halogen	59	38.98	0.042	0.00	0.00	0.06	0.08	0.00	0.08	0.03	0.03	0.03
Dibromodichloromethane	Halogen	59	57.63	0.038	0.00	0.00	0.06	0.07	0.00	0.12	0.04	0.04	0.03
cis-2-Heptene	Alkene	59	71.19	0.035	0.00	0.00	0.06	0.07	0.00	0.11	0.04	0.04	0.04
sec-Butylbenzene	Aromatic	59	88.14	0.035	0.00	0.02	0.04	0.07	0.00	0.24	0.00	0.04	0.07
cis-2-Heptene	Alkene	59	23.73	0.033	0.00	0.00	0.00	0.18	0.00	0.24	0.00	0.04	0.07
iso-Butylbenzene	Aromatic	59	96.61	0.032	0.01	0.02	0.04	0.04	0.00	0.07	0.02	0.03	0.02
1,1-Dichloroethane	Halogen	59	57.63	0.032	0.00	0.00	0.04	0.06	0.00	0.06	0.03	0.02	0.02
2,2,5-Trimethylhexane	Alkane	59	33.90	0.030	0.00	0.00	0.05	0.11	0.00	0.24	0.00	0.03	0.05
1,1,2,2-Tetrachloroethane	Halogen	59	52.54	0.030	0.00	0.00	0.04	0.06	0.00	0.08	0.02	0.02	0.02
3,6-Dimethylcyclohexane	Alkene	59	57.63	0.026	0.00	0.00	0.05	0.08	0.00	0.15	0.02	0.03	0.04
1,2-Diethylbenzene	Aromatic	59	74.98	0.027	0.00	0.00	0.04	0.05	0.00	0.10	0.02	0.02	0.02
Benzylchloride	Halogen	53	56.60	0.026	0.00	0.00	0.05	0.09	0.00	0.09	0.02	0.03	0.03
cis-1,2-Dichloroethylene	Halogen	59	61.02	0.025	0.00	0.00	0.04	0.04	0.00	0.06	0.03	0.03	0.03
trans-3-Methyl-2-pentene	Alkene	59	38.98	0.023	0.00	0.00	0.05	0.09	0.00	0.15	0.00	0.02	0.02
trans-1,2-Dichloroethylene	Halogen	59	49.15	0.022	0.00	0.00	0.04	0.04	0.00	0.06	0.00	0.02	0.02
1-Nonene	Alkene	48	20.83	0.021	0.00	0.00	0.03	0.08	0.00	0.20	0.00	0.02	0.04
cis-2-Octene	Alkene	59	27.12	0.021	0.00	0.00	0.03	0.06	0.00	0.16	0.02	0.02	0.03
cis-1,4-Dimethylcyclohexane	Alkene	59	55.93	0.021	0.00	0.00	0.03	0.06	0.00	0.20	0.00	0.02	0.05
3-Methyl-1-pentene	Alkene	59	25.42	0.021	0.00	0.00	0.01	0.10	0.00	0.18	0.00	0.02	0.04
trans-1,4-Dimethylcyclohexane	Alkene	59	44.07	0.020	0.00	0.00	0.03	0.08	0.00	0.08	0.00	0.02	0.02
BDN	Halogen	59	37.29	0.020	0.00	0.00	0.04	0.06	0.00	0.10	0.01	0.02	0.02
2-Ethyl-1-Butene	Alkene	59	50.85	0.017	0.00	0.00	0.03	0.05	0.00	0.10	0.01	0.02	0.02
Ethylbenzene	Halogen	59	35.59	0.017	0.00	0.00	0.00	0.02	0.00	0.53	0.00	0.03	0.11
cis-3-Heptene	Alkene	59	10.17	0.016	0.00	0.00	0.00	0.02	0.00	0.10	0.00	0.01	0.02
1,2-Dichloropropane	Halogen	59	28.81	0.014	0.00	0.00	0.00	0.07	0.00	0.19	0.00	0.02	0.04
4-Methyl-1-pentene	Alkene	59	15.25	0.013	0.00	0.00	0.02	0.04	0.00	0.08	0.00	0.01	0.02
trans-2-Heptene	Alkene	59	30.51	0.009	0.00	0.00	0.02	0.03	0.00	0.06	0.00	0.01	0.02
2,2,3-Trimethylbutane	Alkane	59	32.20	0.009	0.00	0.00	0.00	0.03	0.00	0.08	0.00	0.01	0.02
1,1,2-Trichloroethane	Halogen	59	20.34	0.008	0.00	0.00	0.00	0.03	0.00	0.08	0.00	0.01	0.02
cis-1,3-Dichloropropene	Halogen	59	8.47	0.006	0.00	0.00	0.00	0.00	0.00	0.13	0.00	0.00	0.02

TABLE 41 VOC Annual Statistics at Hamilton Downtown (1997)

Unit =micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Samples >DL	% Average Max	P E R C E N T I L E S							Max	Median	Mean	Std. Dev.
					5%	25%	75%	90%	Min.						
1,1-Dichloroethane	Halogen	59	6.78	0.006	0.00	0.00	0.00	0.00	0.00	0.00	0.06	0.00	0.00	0.01	
Chlorobenzene	Halogen	59	18.64	0.006	0.00	0.00	0.00	0.02	0.00	0.00	0.07	0.00	0.01	0.01	
trans-1,3-Dichloropropene	Halogen	59	3.39	0.005	0.00	0.00	0.00	0.00	0.00	0.00	0.12	0.00	0.00	0.02	
1,2,4-Trichlorobenzene	Halogen	59	8.47	0.004	0.00	0.00	0.00	0.00	0.00	0.00	0.10	0.00	0.00	0.01	
tert-Butylbenzene	Aromatic	59	20.34	0.005	0.00	0.00	0.00	0.03	0.00	0.00	0.06	0.00	0.01	0.01	
Vinylchloride	Halogen	59	22.03	0.005	0.00	0.00	0.00	0.02	0.00	0.04	0.00	0.00	0.00	0.01	
1-Butyne	Alkyne	59	11.86	0.003	0.00	0.00	0.00	0.03	0.00	0.04	0.00	0.00	0.00	0.01	
1,2-Dichlorobenzene	Halogen	59	5.08	0.002	0.00	0.00	0.00	0.00	0.00	0.04	0.00	0.00	0.00	0.01	
Bromotrichloromethane	Halogen	59	1.69	0.001	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
trans-3-Heptene	Alkene	59	11.86	0.001	0.00	0.00	0.00	0.00	0.00	0.01	0.00	0.00	0.00	0.00	
Hexachlorobutadiene	Halogen	59	10.17	0.001	0.00	0.00	0.00	0.00	0.00	0.01	0.00	0.00	0.00	0.00	
Hexylbenzene	Aromatic	59	1.69	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
1,3-Dichlorobenzene	Halogen	59	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	

TABLE 42 VOC Annual Statistics at Ottawa (1997)

Unit—micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Samples >DL	P E R C E N T I L E S										Max.	Median	Mean	Std. Dev.
				% Average Mass	5%	25%	75%	90%	95%	Min.							
Toluene	Aromatic	59	100.00	6.869	0.86	2.21	5.42	7.67	0.30	23.69	3.42	4.42	4.15				
Isopentane	Alkane	59	100.00	6.542	0.91	2.34	5.65	9.08	0.50	11.67	4.01	4.46	2.88				
Butane	Alkane	59	100.00	5.681	0.71	1.31	6.66	10.88	0.46	15.23	3.60	4.65	3.91				
Freon 2	Halogen	59	100.00	5.631	2.33	2.58	2.88	3.03	1.78	4.48	2.76	2.76	0.36				
Ethane	Alkane	59	98.31	5.389	1.33	2.14	4.36	5.04	0.00	6.43	2.99	3.19	1.39				
Propane	Alkane	59	100.00	4.968	0.69	1.89	4.67	5.79	0.58	7.63	3.02	3.41	1.92				
Acetylene	Alkyne	59	100.00	3.873	0.91	1.54	4.09	5.90	0.77	8.14	2.59	3.13	1.96				
Isobutane	Alkane	59	100.00	3.639	0.44	0.75	3.77	6.12	0.38	9.41	1.96	2.72	2.26				
Ethylene	Alkene	59	100.00	3.326	0.73	1.18	2.96	4.02	0.39	7.24	1.97	2.32	1.56				
Freon 11	Halogen	56	100.00	2.912	1.42	1.65	1.84	1.90	1.34	2.02	1.74	1.73	0.16				
2-Methylpentane	Alkane	59	100.00	2.852	0.49	1.16	2.23	3.10	0.20	3.73	1.59	1.74	0.88				
m and p-Xylene	Aromatic	59	100.00	2.667	0.53	0.90	2.22	3.52	0.22	4.88	1.76	1.81	1.10				
Pentane	Alkane	59	100.00	2.530	0.42	0.92	2.35	3.18	0.28	4.08	1.54	1.72	1.01				
Benzene	Aromatic	59	100.00	2.005	0.55	0.90	2.26	2.99	0.34	3.80	1.42	1.59	0.90				
Chloromethane	Halogen	59	100.00	1.427	0.83	0.90	1.03	1.07	0.81	1.24	0.97	0.97	0.10				
1-Butene/isobutene	Alkene	59	100.00	1.417	0.33	0.44	1.26	1.71	0.24	2.83	0.68	0.91	0.58				
3-Methylpentane	Alkane	59	100.00	1.369	0.25	0.49	1.12	1.65	0.20	2.02	0.84	0.89	0.49				
Carbon tetrachloride	Halogen	59	100.00	1.274	0.56	0.63	0.70	0.72	0.48	0.79	0.66	0.66	0.06				
Propylene	Alkene	59	100.00	1.175	0.24	0.40	1.08	1.81	0.08	2.84	0.74	0.85	0.63				
Hexane	Alkane	59	100.00	1.146	0.28	0.37	1.04	1.23	0.14	1.54	0.67	0.73	0.38				
1,1,1-Trichloroethane	Halogen	59	100.00	1.028	0.44	0.49	0.58	0.62	0.43	1.40	0.53	0.55	0.13				
Freon 22	Halogen	59	100.00	1.021	0.34	0.42	0.60	0.71	0.28	1.59	0.51	0.53	0.19				
o-Xylene	Aromatic	59	100.00	0.973	0.20	0.34	0.79	1.24	0.08	1.67	0.61	0.64	0.37				
Ethylbenzene	Aromatic	59	100.00	0.957	0.18	0.34	0.76	1.05	0.10	1.36	0.59	0.60	0.31				
Tetrachloroethylene	Halogen	59	100.00	0.931	0.12	0.26	0.77	1.30	0.06	3.04	0.41	0.61	0.56				
1,2,4-Trinitrobenzene	Aromatic	59	100.00	0.912	0.14	0.30	0.75	0.98	0.08	1.48	0.51	0.58	0.35				
Dichloromethane	Halogen	59	100.00	0.854	0.24	0.34	0.63	0.83	0.20	1.13	0.43	0.50	0.22				
Methylcyclopentane	Alkane	59	100.00	0.811	0.12	0.26	0.77	1.03	0.08	1.36	0.48	0.54	0.32				
3-Methylhexane	Alkane	59	100.00	0.789	0.14	0.29	0.64	0.82	0.12	1.20	0.43	0.49	0.25				
2,2,4-Trinitrophenol	Alkene	59	100.00	0.773	0.14	0.27	0.66	0.88	0.08	1.30	0.44	0.49	0.29				
2-Methylhexane	Alkane	59	100.00	0.725	0.12	0.27	0.64	0.93	0.06	1.20	0.48	0.49	0.28				
2-Methyl-2-butene	Alkene	59	100.00	0.675	0.14	0.23	0.59	0.94	0.04	1.55	0.40	0.48	0.35				
Isoprene	Alkene	59	96.61	0.635	0.06	0.11	0.47	0.79	0.00	1.76	0.20	0.34	0.36				
2,3-Dimethylbutane	Alkane	59	100.00	0.617	0.10	0.22	0.50	0.75	0.08	0.97	0.36	0.40	0.23				
Heptane	Alkane	59	100.00	0.601	0.13	0.22	0.52	0.68	0.08	0.86	0.38	0.38	0.20				
3-Ethyltoluene	Aromatic	59	100.00	0.561	0.10	0.19	0.47	0.72	0.06	0.96	0.34	0.37	0.22				
2,2-Dimethylbutane	Alkane	59	100.00	0.489	0.10	0.18	0.46	0.63	0.06	1.11	0.32	0.35	0.21				
2,3-Dimethylpentane	Alkane	59	100.00	0.466	0.10	0.16	0.36	0.50	0.06	1.07	0.24	0.28	0.17				
Naphthalene	Aromatic	59	94.92	0.405	0.04	0.13	0.34	0.54	0.00	0.98	0.19	0.26	0.21				
Cyclopentane	Alkane	59	98.31	0.404	0.08	0.14	0.34	0.48	0.00	0.59	0.24	0.26	0.14				
cis-2-Pentene	Alkene	59	100.00	0.397	0.06	0.12	0.32	0.58	0.03	0.91	0.20	0.26	0.21				
Decane	Alkane	59	98.31	0.395	0.06	0.14	0.32	0.39	0.00	0.74	0.23	0.24	0.15				
3-Methylheptane	Alkane	59	94.92	0.350	0.05	0.14	0.36	0.43	0.00	0.62	0.23	0.25	0.15				
2-Methylheptane	Alkane	59	91.53	0.331	0.00	0.12	0.30	0.39	0.00	0.57	0.22	0.22	0.13				

TABLE 42 VOC Annual Statistics at Ottawa (1997)

Unit = micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Samples > DI	P E R C E N T I L E S					Max.	Median	Mean	Std. Dev.
				%	25%	75%	90%	95%				
cis-2-Butene	Alkene	59	100.00	0.18	0.06	0.10	0.12	0.18	0.61	0.18	0.23	0.16
1-Pentene	Alkene	59	100.00	0.349	0.08	0.12	0.24	0.38	0.02	0.18	0.21	0.13
1-Hexene	Alkene	59	89.83	0.338	0.00	0.12	0.26	0.37	0.00	0.64	0.21	0.15
trans-2-Butene	Alkene	59	98.31	0.332	0.04	0.09	0.35	0.50	0.00	0.66	0.18	0.23
trans-1,4	Halogen	59	100.00	0.321	0.10	0.12	0.18	0.22	0.10	0.26	0.14	0.16
Methylcyclohexane	Alkane	59	96.61	0.311	0.06	0.10	0.28	0.36	0.00	0.52	0.21	0.12
Undecane	Alkane	59	96.61	0.308	0.02	0.10	0.25	0.34	0.00	0.56	0.18	0.19
4-Ethylthiophene	Aromatic	59	100.00	0.302	0.06	0.11	0.25	0.33	0.02	0.46	0.18	0.19
Cyclohexane	Alkane	59	96.61	0.301	0.06	0.11	0.24	0.30	0.00	0.68	0.15	0.18
Nonane	Alkane	59	96.61	0.290	0.06	0.12	0.24	0.29	0.00	0.59	0.16	0.11
1,3,5-Trimethylbenzene	Aromatic	59	100.00	0.284	0.04	0.09	0.22	0.34	0.02	0.50	0.16	0.18
2,3,4-Trimethylpentane	Alkane	59	98.31	0.280	0.06	0.10	0.22	0.30	0.00	0.46	0.16	0.18
Cyclohexane	Alkane	59	96.61	0.276	0.06	0.10	0.26	0.32	0.00	0.46	0.18	0.10
Chloroform	Halogen	59	100.00	0.271	0.08	0.11	0.16	0.22	0.07	0.34	0.13	0.14
1,4-Dichlorobenzene	Halogen	59	100.00	0.260	0.04	0.10	0.18	0.28	0.02	0.57	0.16	0.12
2-Ethylthiophene	Aromatic	59	100.00	0.259	0.04	0.10	0.20	0.28	0.02	0.37	0.14	0.16
trans-2-Pentene	Alkene	59	98.31	0.247	0.04	0.09	0.22	0.28	0.00	0.88	0.15	0.09
1,3-Butadiene	Alkene	59	91.53	0.238	0.00	0.08	0.20	0.34	0.00	0.58	0.12	0.13
1,2,3-Trimethylbenzene	Aromatic	59	98.31	0.232	0.04	0.09	0.19	0.24	0.00	0.34	0.14	0.08
2,4-Dimethylpentene	Alkane	59	96.61	0.227	0.04	0.08	0.20	0.26	0.00	0.37	0.13	0.15
Bromomethane	Halogen	59	100.00	0.224	0.06	0.07	0.14	0.16	0.05	0.35	0.10	0.11
1,4-Diethylbenzene	Aromatic	59	96.61	0.221	0.04	0.08	0.18	0.24	0.00	0.36	0.12	0.13
trifluorobenzene	Aromatic	59	100.00	0.223	0.04	0.08	0.18	0.22	0.04	0.28	0.12	0.13
Styrene	Aromatic	56	80.36	0.216	0.00	0.04	0.19	0.28	0.00	1.25	0.10	0.16
2-Methyl-1-butene	Alkene	59	94.92	0.193	0.02	0.05	0.19	0.26	0.00	0.34	0.12	0.13
Triethoxyethylene	Halogen	56	96.43	0.188	0.03	0.06	0.13	0.24	0.00	0.52	0.10	0.12
2,4-Dimethylhexane	Alkane	59	94.92	0.157	0.04	0.06	0.17	0.20	0.00	0.29	0.10	0.12
Dodecane	Alkane	59	91.53	0.130	0.00	0.05	0.12	0.16	0.00	0.24	0.10	0.05
Chloroethane	Halogen	59	89.83	0.127	0.00	0.04	0.08	0.12	0.00	0.14	0.07	0.04
2,5-Dimethylhexane	Alkane	59	84.75	0.124	0.00	0.04	0.12	0.15	0.00	0.26	0.07	0.08
1-Methylcyclopentene	Alkene	59	96.61	0.119	0.03	0.04	0.10	0.14	0.00	0.26	0.07	0.08
Indane	Aromatic	59	96.61	0.116	0.02	0.04	0.10	0.13	0.00	0.16	0.07	0.04
p-Cymene	Aromatic	59	81.36	0.112	0.00	0.03	0.10	0.12	0.00	0.22	0.06	0.07
1,2-Dichloroethane	Halogen	59	100.00	0.111	0.03	0.04	0.06	0.08	0.03	0.10	0.05	0.05
Dibromomethane	Halogen	59	86.44	0.108	0.00	0.03	0.07	0.10	0.00	0.12	0.06	0.05
4-Methylpentane	Alkane	59	69.49	0.109	0.00	0.00	0.14	0.16	0.00	0.26	0.07	0.08
Cyclopentene	Alkene	59	96.61	0.109	0.02	0.04	0.08	0.12	0.00	0.15	0.06	0.07
cis-3-Methyl-2-pentene	Alkene	59	88.14	0.103	0.00	0.03	0.08	0.10	0.00	0.26	0.05	0.04
cis-1,3-Dimethylcyclohexane	Alkane	59	89.83	0.088	0.00	0.03	0.08	0.11	0.00	0.34	0.06	0.06
trans-4-Methyl-2-pentene	Alkene	59	27.12	0.083	0.00	0.00	0.03	0.37	0.00	0.73	0.00	0.18
iso-Propylbenzene	Aromatic	59	96.61	0.081	0.02	0.03	0.07	0.08	0.00	0.10	0.05	0.05
trans-2-Hexene	Alkene	59	94.92	0.076	0.02	0.03	0.06	0.08	0.00	0.12	0.04	0.03
1-Methylcyclohexene	Alkene	59	84.75	0.064	0.00	0.02	0.06	0.10	0.00	0.14	0.04	0.05
2,2-Dimethylpentene	Alkane	59	83.05	0.061	0.00	0.03	0.07	0.08	0.00	0.10	0.05	0.03



TABLE 42. VOC Annual Statistics at Ottawa (1997)

Unit = micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Sample >DL	% Average Mass	P E R C E N T I L E S							Max.	Median	Mean	Std. Dev.
					5%	25%	75%	90%	95%	99%	99.5%				
Cyclohexane	Alkene	51	94.12	0.001	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.10	0.01	0.01	0.02
2,2-Dimethylpropane	Alkane	59	88.14	0.061	0.00	0.00	0.00	0.05	0.07	0.00	0.00	0.10	0.04	0.04	0.02
2,2-Dimethylhexane	Alkane	59	77.97	0.057	0.00	0.01	0.04	0.04	0.00	0.00	0.38	0.00	0.02	0.03	0.05
1,1-Dichloroethylene	Halogen	59	61.02	0.057	0.00	0.00	0.04	0.08	0.00	0.00	0.08	0.00	0.02	0.03	0.03
Isomofuran	Halogen	56	92.86	0.055	0.00	0.02	0.04	0.05	0.00	0.00	0.06	0.00	0.03	0.03	0.02
Acetone	Aromatic	59	89.83	0.057	0.00	0.00	0.04	0.06	0.00	0.00	0.08	0.00	0.03	0.03	0.02
Isomochloroethane	Halogen	59	44.07	0.052	0.00	0.00	0.05	0.08	0.00	0.00	0.10	0.00	0.00	0.03	0.03
cis-4-Methyl-2-pentene	Alkene	59	27.12	0.053	0.00	0.00	0.04	0.17	0.00	0.00	0.32	0.00	0.01	0.01	0.09
trans-1,2-Dimethylcyclohexane	Alkene	57	68.42	0.051	0.00	0.00	0.05	0.07	0.00	0.00	0.24	0.00	0.03	0.03	0.04
1-Heptene	Alkene	53	7.55	0.049	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.03	0.14
n-Butylbenzene	Aromatic	59	88.14	0.047	0.00	0.02	0.04	0.06	0.00	0.00	0.07	0.00	0.03	0.03	0.02
trans-2-Octene	Alkene	59	59.32	0.045	0.00	0.00	0.04	0.08	0.00	0.00	0.14	0.00	0.03	0.03	0.03
Dibromochloromethane	Halogen	59	49.15	0.043	0.00	0.00	0.04	0.06	0.00	0.00	0.08	0.00	0.02	0.03	0.03
cis-2-Hexene	Alkene	59	67.80	0.041	0.00	0.00	0.04	0.06	0.00	0.00	0.08	0.00	0.03	0.03	0.03
trans-3-Methyl-2-pentene	Alkene	59	50.85	0.041	0.00	0.00	0.06	0.08	0.00	0.13	0.00	0.00	0.02	0.03	0.03
cis-2-Heptene	Alkene	57	24.56	0.036	0.00	0.00	0.00	0.10	0.00	0.00	0.16	0.00	0.00	0.02	0.05
Isopropylbenzene	Halogen	56	55.36	0.033	0.00	0.00	0.03	0.05	0.00	0.00	0.07	0.00	0.02	0.02	0.02
1,1,2,2-Tetrachloroethane	Halogen	59	38.98	0.030	0.00	0.00	0.04	0.05	0.00	0.00	0.06	0.00	0.00	0.01	0.02
sec-Butylbenzene	Aromatic	59	84.75	0.028	0.00	0.01	0.02	0.04	0.00	0.04	0.00	0.04	0.02	0.02	0.01
2,2,5-Trimethylhexane	Alkane	51	36.84	0.028	0.00	0.00	0.03	0.06	0.00	0.13	0.00	0.00	0.02	0.02	0.03
trans-Butylbenzene	Aromatic	59	84.75	0.026	0.00	0.01	0.02	0.03	0.00	0.04	0.00	0.04	0.02	0.02	0.01
3,6-Dimethylcyclohexane	Alkene	59	45.76	0.026	0.00	0.00	0.04	0.05	0.00	0.00	0.09	0.00	0.00	0.02	0.02
3-Methyl-1-pentene	Alkene	57	26.32	0.024	0.00	0.00	0.02	0.08	0.00	0.12	0.00	0.00	0.00	0.02	0.03
cis-1,4,6,1,3-Dimethylcyclohexane	Alkene	59	52.63	0.024	0.00	0.00	0.02	0.05	0.00	0.08	0.00	0.08	0.01	0.02	0.02
trans-1,2-Dichloroethylene	Halogen	59	35.59	0.023	0.00	0.00	0.02	0.04	0.00	0.06	0.00	0.06	0.00	0.01	0.02
2-Ethyl-1-Butene	Alkene	57	50.88	0.023	0.00	0.00	0.02	0.04	0.00	0.06	0.00	0.06	0.01	0.02	0.02
cis-1,2-Dichloroethylene	Halogen	59	30.51	0.023	0.00	0.00	0.02	0.04	0.00	0.06	0.00	0.06	0.01	0.01	0.02
cis-2-Octene	Alkene	59	22.03	0.022	0.00	0.00	0.00	0.05	0.00	0.12	0.00	0.00	0.00	0.01	0.03
BDH	Halogen	59	25.42	0.021	0.00	0.00	0.01	0.05	0.00	0.06	0.00	0.06	0.00	0.01	0.02
1-Decene	Alkene	51	7.84	0.021	0.00	0.00	0.00	0.00	0.00	0.32	0.00	0.00	0.00	0.01	0.05
1,1-Dichloroethane	Halogen	59	38.98	0.019	0.00	0.00	0.02	0.04	0.00	0.04	0.00	0.04	0.00	0.01	0.02
1,2-Diethylbenzene	Aromatic	59	61.02	0.019	0.00	0.00	0.02	0.03	0.00	0.04	0.01	0.01	0.01	0.01	0.01
trans-1,4-Dimethylcyclohexane	Alkene	57	45.61	0.019	0.00	0.00	0.02	0.04	0.00	0.06	0.00	0.06	0.00	0.01	0.02
1,2-Dichloropropane	Halogen	59	25.42	0.017	0.00	0.00	0.00	0.04	0.00	0.06	0.00	0.06	0.00	0.01	0.02
1-Octene	Alkene	45	17.78	0.016	0.00	0.00	0.00	0.08	0.00	0.14	0.00	0.00	0.00	0.02	0.07
Ethylbenzene	Halogen	59	27.12	0.016	0.00	0.00	0.01	0.04	0.00	0.06	0.00	0.06	0.00	0.01	0.02
1,1,2-Trichloroethane	Halogen	59	16.95	0.014	0.00	0.00	0.00	0.04	0.00	0.08	0.00	0.08	0.00	0.01	0.02
trans-2-Heptene	Alkene	57	36.84	0.011	0.00	0.00	0.02	0.04	0.00	0.06	0.00	0.06	0.00	0.01	0.02
1-Nonene	Alkene	42	14.29	0.010	0.00	0.00	0.00	0.07	0.00	0.20	0.00	0.00	0.00	0.02	0.04
4-Methyl-1-pentene	Alkene	57	14.04	0.009	0.00	0.00	0.00	0.05	0.00	0.11	0.00	0.00	0.00	0.01	0.02
cis-3-Heptene	Alkene	51	3.92	0.007	0.00	0.00	0.00	0.00	0.00	0.48	0.00	0.00	0.00	0.01	0.07
tert-Butylbenzene	Aromatic	59	16.95	0.006	0.00	0.00	0.00	0.02	0.00	0.03	0.00	0.03	0.00	0.00	0.01
Vinylbenzene	Halogen	59	16.95	0.002	0.00	0.00	0.00	0.01	0.00	0.04	0.00	0.04	0.00	0.00	0.01
2,2,3-Trimethylbutane	Alkene	57	14.04	0.001	0.00	0.00	0.00	0.02	0.00	0.03	0.00	0.03	0.00	0.00	0.01

TABLE 42 VOC Annual Statistics at Ottawa (1997)

Unit—micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Samples	% Sample >DL	% Average Mass	P E R C E N T I L E S							Std. Dev.	
						5%	25%	75%	90%	Min.	Max.	Median		Mean
1-Butyne	Alkyne	59	3.39		0.000	0.00	0.00	0.00	0.00	0.00	0.03	0.00	0.00	0.00
1,4-Dichlorobutane	Halogen	59	3.39		0.000	0.00	0.00	0.00	0.00	0.00	0.04	0.00	0.00	0.01
Hexachlorocyclopentadiene	Halogen	59	13.56		0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
trans-3-Heptyne	Alkyne	54	7.41		0.000	0.00	0.00	0.00	0.00	0.00	0.01	0.00	0.00	0.00
Hexylbenzene	Aromatic	59	1.69		0.000	0.00	0.00	0.00	0.00	0.00	0.02	0.00	0.00	0.00
cis-1,3-Dichlorocyclopentene	Halogen	59	0.00		0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
trans-1,3-Dichlorocyclopentene	Halogen	59	0.00		0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Bromotrichloromethane	Halogen	59	0.00		0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Chlorobenzene	Halogen	59	0.00		0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,3-Dichlorobenzene	Halogen	59	0.00		0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,2-Dichlorobenzene	Halogen	59	0.00		0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,2,4-Trichlorobenzene	Halogen	59	0.00		0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,3-Dichlorobenzene	Halogen	59	0.00		0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

TABLE 43 VOC Annual Statistics at Point Petre (1997)

Unit =micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Samples > DL	% Average Mass	P E R C E N T I L E S							Max.	Median	Median	Std. Dev.
					5%	25%	75%	90%	Min.						
Front12	Halogen	58	100.00	15.320	3.21	3.80	5.82	6.81	2.76	9.71	4.62	4.81	1.42		
Dichloromethane	Halogen	58	100.00	14.118	0.54	0.94	3.85	22.43	0.40	250.24	1.78	11.36	35.66		
Ellane	Alkane	58	100.00	8.728	1.36	2.03	3.75	4.44	1.10	6.22	2.64	2.93	1.13		
Propane	Alkane	58	100.00	5.946	0.50	1.08	2.81	3.66	0.43	6.52	1.79	2.07	1.31		
Front11	Halogen	52	100.00	5.994	1.63	1.84	2.09	2.18	1.54	2.35	1.96	1.96	0.19		
1,1,1-Trichloroethane	Halogen	58	100.00	4.124	0.46	0.96	1.67	2.02	0.42	2.66	1.35	1.31	0.57		
Butane	Alkane	58	100.00	3.692	0.22	0.64	1.91	2.41	0.14	4.80	1.15	1.33	0.97		
Acetylene	Alkyne	58	100.00	3.392	0.26	0.73	1.54	1.84	0.25	3.33	1.08	1.16	0.64		
Isopentane	Alkane	58	100.00	3.130	0.36	0.67	1.40	1.82	0.20	2.92	0.99	1.11	0.58		
Toluene	Aromatic	58	100.00	3.112	0.38	0.71	1.37	1.97	0.30	2.44	0.89	1.07	0.53		
Chloroethane	Aromatic	58	100.00	3.029	0.81	0.92	1.02	1.05	0.71	1.24	0.97	0.97	0.09		
Carbon tetrachloride	Halogen	58	100.00	2.155	0.60	0.66	0.72	0.75	0.54	0.82	0.69	0.69	0.06		
Iodobutane	Alkane	58	100.00	1.923	0.18	0.32	0.94	1.12	0.07	2.22	0.58	0.67	0.43		
2-Methylpentane	Alkane	58	100.00	1.838	0.17	0.31	0.90	1.07	0.08	1.72	0.63	0.63	0.35		
m and p-Xylene	Aromatic	58	100.00	1.795	0.23	0.40	0.73	1.10	0.02	1.37	0.54	0.61	0.31		
Ethylene	Alkene	58	100.00	1.714	0.18	0.30	0.83	1.04	0.08	2.00	0.52	0.60	0.40		
Pentane	Alkane	58	100.00	1.715	0.20	0.33	0.78	0.94	0.15	1.76	0.58	0.61	0.35		
Benzene	Aromatic	58	100.00	1.649	0.24	0.37	0.70	0.81	0.14	1.82	0.57	0.57	0.28		
Front22	Halogen	58	100.00	1.152	0.26	0.32	0.43	0.49	0.20	0.52	0.18	0.37	0.08		
1-Butene	Alkene	58	100.00	1.018	0.18	0.22	0.36	0.54	0.10	2.15	0.32	0.36	0.30		
1-Butene/Isobutene	Alkene	58	98.28	0.897	0.17	0.24	0.35	0.43	0.00	0.55	0.28	0.29	0.10		
Ethylbenzene	Aromatic	58	100.00	0.697	0.10	0.16	0.30	0.39	0.04	0.54	0.22	0.24	0.11		
3-Methylpentane	Alkane	58	100.00	0.632	0.10	0.15	0.26	0.34	0.04	0.64	0.21	0.22	0.11		
o-Xylene	Aromatic	58	100.00	0.593	0.08	0.13	0.25	0.35	0.02	0.44	0.18	0.20	0.10		
Tetrachloroethylene	Halogen	58	100.00	0.541	0.09	0.14	0.22	0.26	0.08	0.42	0.17	0.18	0.07		
Front14	Halogen	58	100.00	0.515	0.11	0.13	0.20	0.23	0.10	0.28	0.15	0.16	0.05		
2,2,4-Timethylpentane	Alkane	58	96.55	0.463	0.05	0.09	0.23	0.30	0.00	0.50	0.14	0.17	0.11		
Propylene	Alkene	58	93.10	0.454	0.00	0.10	0.20	0.28	0.00	0.38	0.14	0.16	0.09		
3-Methylhexane	Alkane	58	94.83	0.431	0.03	0.07	0.20	0.28	0.00	0.43	0.12	0.15	0.10		
Heptane	Alkane	58	94.83	0.354	0.03	0.08	0.16	0.21	0.00	0.36	0.11	0.12	0.07		
Isobutene	Alkene	58	100.00	0.349	0.06	0.08	0.15	0.18	0.05	0.22	0.11	0.11	0.04		
Dimethylmethane	Alkane	58	96.55	0.335	0.04	0.06	0.14	0.21	0.00	0.40	0.10	0.12	0.08		
Methylcyclopentane	Alkane	58	100.00	0.326	0.04	0.06	0.14	0.21	0.02	0.30	0.09	0.11	0.06		
Undecane	Alkane	58	100.00	0.314	0.04	0.06	0.14	0.21	0.02	0.22	0.11	0.12	0.05		
Trichloroethylene	Halogen	58	100.00	0.314	0.04	0.08	0.16	0.18	0.02	0.22	0.11	0.10	0.02		
Chloroform	Halogen	58	100.00	0.307	0.08	0.08	0.11	0.12	0.06	0.14	0.10	0.10	0.11		
1-Hexene	Alkene	58	53.45	0.289	0.00	0.00	0.17	0.24	0.00	0.47	0.08	0.10	0.05		
1,2,4-Timethylbenzene	Aromatic	58	98.28	0.279	0.04	0.06	0.12	0.17	0.00	0.30	0.09	0.10	0.09		
Cyclohexane	Alkane	58	82.76	0.271	0.00	0.05	0.14	0.20	0.00	0.54	0.08	0.10	0.09		
2-Methylhexane	Alkane	58	98.28	0.263	0.00	0.03	0.14	0.18	0.00	0.38	0.09	0.09	0.08		
2,2-Dimethylbutane	Alkane	58	56.60	0.255	0.03	0.06	0.10	0.14	0.00	0.24	0.09	0.09	0.04		
Isoprene	Alkene	53	93.10	0.237	0.00	0.00	0.17	0.25	0.00	0.52	0.03	0.09	0.12		
Decane	Alkane	58	86.21	0.232	0.00	0.06	0.10	0.14	0.00	0.19	0.07	0.08	0.04		
2,3-Dimethylbutane	Alkane	58	94.83	0.226	0.00	0.05	0.12	0.16	0.00	0.24	0.08	0.08	0.06		
Undecane	Alkane	58	77.59	0.220	0.02	0.04	0.10	0.13	0.00	0.21	0.06	0.07	0.04		
2,3-Dimethylpentane	Alkane	58	94.83	0.218	0.00	0.04	0.11	0.15	0.00	0.35	0.06	0.08	0.08		
p-Cymene	Aromatic	58	75.86	0.191	0.00	0.02	0.09	0.12	0.00	0.43	0.04	0.06	0.07		
1-Heptene	Alkene	58	79.31	0.182	0.00	0.03	0.08	0.11	0.00	0.14	0.06	0.06	0.04		
3-Ethyltoluene	Aromatic	58	96.55	0.178	0.02	0.04	0.08	0.11	0.00	0.22	0.06	0.06	0.04		

TABLE 43 VOC Annual Statistics at Point Petre (1997)

Unit =micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Sampled-DL	% Average Max	P E R C E N T I L E S							Median	Median	Std. Dev.
					5%	25%	75%	90%	Min.	Max.	Median			
Naphthalene	Aromatic	72	72.41	0.171	0.01	0.03	0.09	0.13	0.00	0.18	0.06	0.06	0.06	0.03
Oxane	Alkane	58	80.71	0.167	0.03	0.03	0.08	0.10	0.00	0.14	0.06	0.06	0.06	0.04
Cyclopentane	Alkane	58	84.88	0.164	0.03	0.03	0.08	0.10	0.00	0.20	0.06	0.06	0.06	0.04
Polysomonethane	Halogen	58	84.88	0.163	0.00	0.02	0.07	0.10	0.00	0.14	0.06	0.05	0.04	0.04
2-Methyl-2-butene	Alkene	58	93.10	0.161	0.00	0.01	0.07	0.08	0.00	0.14	0.06	0.05	0.04	0.04
Methylcyclohexane	Alkane	58	82.76	0.155	0.00	0.02	0.08	0.12	0.00	0.18	0.05	0.06	0.04	0.04
1,2-Dichloroethane	Halogen	58	98.28	0.156	0.02	0.04	0.06	0.08	0.00	0.10	0.05	0.05	0.02	0.02
2,3,4-Trimethylpentane	Alkane	58	82.76	0.153	0.00	0.03	0.08	0.10	0.00	0.16	0.06	0.05	0.04	0.04
Nonane	Alkane	58	82.76	0.148	0.00	0.04	0.08	0.10	0.00	0.12	0.06	0.05	0.03	0.03
1-Methylpentane	Alkane	58	72.41	0.146	0.03	0.03	0.08	0.12	0.00	0.18	0.05	0.05	0.05	0.05
Chloroethane	Halogen	58	74.14	0.135	0.00	0.01	0.07	0.08	0.00	0.12	0.04	0.04	0.04	0.03
4-Ethylcyclohexane	Aromatic	58	96.55	0.127	0.02	0.03	0.06	0.09	0.00	0.16	0.04	0.04	0.04	0.03
cis-2-Pentene	Alkene	58	65.52	0.123	0.00	0.00	0.07	0.09	0.00	0.15	0.04	0.04	0.04	0.04
2-Ethylcyclohexane	Aromatic	58	96.55	0.115	0.01	0.02	0.04	0.07	0.00	0.12	0.03	0.03	0.03	0.03
m-Propylbenzene	Aromatic	58	96.55	0.111	0.02	0.02	0.05	0.06	0.00	0.14	0.04	0.04	0.04	0.02
2,4-Dimethylpentane	Alkane	58	74.14	0.106	0.00	0.01	0.06	0.08	0.00	0.16	0.04	0.04	0.04	0.04
2-Methylheptane	Alkane	57	52.63	0.103	0.00	0.00	0.06	0.09	0.00	0.22	0.03	0.03	0.03	0.05
1,2,3-Trimethylbenzene	Aromatic	58	94.83	0.098	0.01	0.02	0.03	0.05	0.00	0.10	0.03	0.03	0.03	0.02
1,4-Dichloroethylene	Halogen	58	60.34	0.093	0.00	0.00	0.06	0.08	0.00	0.10	0.03	0.03	0.03	0.03
Bromobenzene	Halogen	52	94.23	0.088	0.01	0.02	0.04	0.06	0.00	0.08	0.03	0.03	0.03	0.02
2,4-Dimethylhexane	Alkane	58	63.79	0.088	0.00	0.03	0.05	0.06	0.00	0.12	0.02	0.02	0.02	0.03
1,4-Dichlorobenzene	Halogen	58	94.83	0.085	0.01	0.02	0.04	0.06	0.00	0.08	0.03	0.03	0.03	0.01
1,3,5-Trimethylbenzene	Aromatic	58	94.83	0.083	0.00	0.02	0.04	0.06	0.00	0.08	0.02	0.02	0.02	0.02
Bromodichloromethane	Halogen	58	41.83	0.081	0.00	0.00	0.05	0.06	0.00	0.10	0.00	0.03	0.03	0.03
1,4-Diethylbenzene	Aromatic	58	70.69	0.079	0.00	0.00	0.04	0.05	0.00	0.12	0.03	0.03	0.03	0.03
Styrene	Aromatic	53	32.08	0.078	0.00	0.00	0.04	0.10	0.00	0.30	0.00	0.03	0.03	0.06
iso-Propylbenzene	Aromatic	58	93.10	0.071	0.00	0.02	0.03	0.04	0.00	0.08	0.02	0.02	0.02	0.01
2,5-Dimethylhexane	Alkane	58	48.28	0.071	0.00	0.00	0.03	0.06	0.00	0.23	0.00	0.02	0.02	0.04
Dibromochloromethane	Halogen	58	55.17	0.070	0.00	0.00	0.04	0.06	0.00	0.08	0.02	0.02	0.02	0.02
2-Methyl-1-butene	Alkene	58	58.62	0.068	0.00	0.00	0.03	0.07	0.00	0.12	0.02	0.02	0.02	0.03
2,2-Dimethylpropane	Alkane	58	70.69	0.064	0.00	0.00	0.04	0.04	0.00	0.08	0.02	0.02	0.02	0.02
1,1,2,2-Tetrachloroethane	Halogen	58	53.45	0.061	0.00	0.00	0.04	0.06	0.00	0.06	0.01	0.02	0.02	0.02
Benzylchloride	Halogen	52	53.85	0.060	0.00	0.00	0.04	0.05	0.00	0.12	0.02	0.02	0.02	0.03
Indane	Aromatic	58	82.76	0.058	0.00	0.01	0.02	0.03	0.00	0.08	0.02	0.02	0.02	0.01
1-Methylcyclohexene	Alkene	58	50.00	0.054	0.00	0.00	0.03	0.05	0.00	0.08	0.01	0.02	0.02	0.02
Cyclohexene	Alkene	49	63.27	0.054	0.00	0.00	0.04	0.05	0.00	0.07	0.02	0.02	0.02	0.02
cis-2-Heptene	Alkene	56	21.43	0.051	0.00	0.00	0.00	0.08	0.00	0.15	0.00	0.02	0.02	0.04
1,1-Dichloroethane	Halogen	58	51.72	0.047	0.00	0.00	0.03	0.04	0.00	0.06	0.01	0.02	0.02	0.02
1,2-Dichloropropane	Halogen	58	39.66	0.046	0.00	0.00	0.02	0.04	0.00	0.08	0.00	0.01	0.02	0.02
cis-2-Butene	Alkene	58	46.55	0.044	0.00	0.00	0.03	0.04	0.00	0.06	0.00	0.02	0.02	0.02
cis-1,2-Dichloroethylene	Halogen	58	46.55	0.042	0.00	0.00	0.02	0.04	0.00	0.06	0.00	0.01	0.02	0.02
Cyclopentene	Alkene	58	55.17	0.042	0.00	0.00	0.02	0.04	0.00	0.06	0.01	0.01	0.02	0.02
cis-1,3-Dimethylcyclohexane	Alkane	58	55.17	0.039	0.00	0.00	0.02	0.03	0.00	0.06	0.01	0.01	0.02	0.02
1-Methylcyclopentene	Alkene	58	51.72	0.039	0.00	0.00	0.02	0.03	0.00	0.06	0.01	0.01	0.02	0.02
trans-1,2-Dichloroethylene	Halogen	58	46.55	0.037	0.00	0.00	0.02	0.04	0.00	0.05	0.00	0.01	0.02	0.02
Ethylbromide	Halogen	58	37.93	0.035	0.00	0.00	0.02	0.04	0.00	0.06	0.00	0.01	0.02	0.02
trans-2-Butene	Alkene	58	39.66	0.033	0.00	0.00	0.02	0.04	0.00	0.06	0.00	0.01	0.02	0.02
4-Methylheptane	Alkane	57	38.84	0.033	0.00	0.00	0.02	0.04	0.00	0.09	0.00	0.01	0.02	0.02



TABLE 43 VOC Annual Statistics at Point Petre (1997)

Unit =micrograms/m<sup>3</sup>

Compounds	Compound Class	No of Samples	% Samples >DI	% Average Mass	P E R C E N T I L E S							Median	Std. Dev.
					5%	25%	75%	90%	Min.	Max.	Median		
1,3-Butadiene	Allene	58	18.97	0.031	0.00	0.00	0.00	0.03	0.00	0.34	0.00	0.01	0.04
EDB	Halogen	58	29.31	0.030	0.00	0.00	0.02	0.03	0.00	0.08	0.00	0.01	0.02
2,2-Dimethylhexane	Alkane	58	39.66	0.040	0.00	0.00	0.01	0.03	0.00	0.12	0.00	0.01	0.02
1-Heptene	Alkene	57	8.77	0.038	0.00	0.00	0.00	0.00	0.00	0.20	0.00	0.01	0.03
cis-3-Methyl-2-pentene	Alkene	58	17.24	0.027	0.00	0.00	0.00	0.01	0.00	0.22	0.00	0.01	0.03
sec-Butylbenzene	Aromatic	58	58.62	0.026	0.00	0.00	0.02	0.00	0.00	0.06	0.01	0.01	0.01
iso-Butylbenzene	Aromatic	58	53.45	0.025	0.00	0.00	0.01	0.02	0.00	0.04	0.01	0.01	0.01
1,1,2-Trichloroethane	Halogen	58	24.14	0.025	0.00	0.00	0.00	0.04	0.00	0.08	0.00	0.01	0.02
1,3-Dichlorobenzene	Aromatic	58	46.55	0.023	0.00	0.00	0.01	0.02	0.00	0.04	0.00	0.01	0.01
2,2-Dimethylpentane	Alkane	58	32.76	0.023	0.00	0.00	0.02	0.03	0.00	0.08	0.00	0.01	0.02
trans-4-Methyl-2-pentene	Alkene	58	8.62	0.019	0.00	0.00	0.00	0.00	0.00	0.10	0.00	0.01	0.02
n-Butylbenzene	Aromatic	58	43.10	0.020	0.00	0.00	0.01	0.02	0.00	0.04	0.00	0.01	0.01
cis-4-Methyl-2-pentene	Alkene	58	22.41	0.017	0.00	0.00	0.00	0.02	0.00	0.05	0.00	0.01	0.01
1,2-Dichlorobenzene	Aromatic	58	36.21	0.018	0.00	0.00	0.01	0.02	0.00	0.04	0.00	0.01	0.01
1-Octene	Alkene	46	15.22	0.017	0.00	0.00	0.00	0.02	0.00	0.09	0.00	0.01	0.02
2,2,5-Trimethylhexane	Alkane	55	23.21	0.016	0.00	0.00	0.00	0.03	0.00	0.06	0.00	0.01	0.01
trans-1,2-Dimethylcyclohexane	Alkane	56	28.57	0.015	0.00	0.00	0.01	0.02	0.00	0.03	0.00	0.01	0.01
trans-2-Pentene	Alkene	58	36.21	0.014	0.00	0.00	0.01	0.01	0.00	0.04	0.00	0.00	0.01
trans-2-Hexene	Alkene	58	32.76	0.013	0.00	0.00	0.01	0.01	0.00	0.04	0.00	0.00	0.01
trans-2-Octene	Alkene	58	15.52	0.012	0.00	0.00	0.00	0.02	0.00	0.05	0.00	0.00	0.01
Vinylchloride	Halogen	58	20.69	0.009	0.00	0.00	0.00	0.01	0.00	0.03	0.00	0.00	0.01
trans-1,4-Dimethylcyclohexane	Alkane	56	21.43	0.009	0.00	0.00	0.00	0.01	0.00	0.03	0.00	0.00	0.01
trans-2-Heptene	Alkene	56	17.86	0.009	0.00	0.00	0.00	0.02	0.00	0.03	0.00	0.00	0.01
cis-2-Octene	Alkene	58	8.62	0.006	0.00	0.00	0.00	0.00	0.00	0.04	0.00	0.00	0.01
cis-1,4,1,3-Dimethylcyclohexane	Alkane	56	23.21	0.006	0.00	0.00	0.00	0.01	0.00	0.01	0.00	0.00	0.00
4-Methyl-1-pentene	Alkene	56	7.14	0.005	0.00	0.00	0.00	0.00	0.00	0.03	0.00	0.00	0.01
3-Methyl-1-pentene	Alkene	56	5.36	0.004	0.00	0.00	0.00	0.00	0.00	0.04	0.00	0.00	0.01
3,6-Dimethylcyclooctane	Alkane	58	10.34	0.004	0.00	0.00	0.00	0.00	0.00	0.02	0.00	0.00	0.01
1-Butyne	Alkyne	58	5.17	0.004	0.00	0.00	0.00	0.00	0.00	0.04	0.00	0.00	0.01
tert-Butylbenzene	Aromatic	58	1.72	0.002	0.00	0.00	0.00	0.00	0.00	0.02	0.00	0.00	0.00
cis-1,3-Dichloropropene	Halogen	58	1.72	0.001	0.00	0.00	0.00	0.00	0.00	0.02	0.00	0.00	0.00
2-Ethyl-1-butene	Alkene	56	5.36	0.001	0.00	0.00	0.00	0.00	0.00	0.01	0.00	0.00	0.00
cis-2-Hexene	Alkene	58	1.72	0.000	0.00	0.00	0.00	0.00	0.00	0.01	0.00	0.00	0.00
trans-3-Methyl-2-pentene	Alkene	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.02	0.00	0.00	0.00
2,2,3-Trimethylbutane	Alkane	56	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
trans-3-Heptene	Alkene	55	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
cis-3-Heptene	Alkene	55	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1-Nonene	Alkene	41	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1-Decene	Alkene	50	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Hexylbenzene	Aromatic	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
trans-1,3-Trichloropropene	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Bromotrichloromethane	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Chlorobenzene	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,4-Dichlorobutane	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,1-Dichlorobenzene	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,2-Dichlorobenzene	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,2,4-Trichlorobenzene	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Hexachlorobutadiene	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

TABLE 44 VOC Annual Statistics at Sarnia (1997)

Unit = micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Samples > DL	P E R C E N T I L E S										Mean	Std. Dev.
				% Average Mass	5%	25%	75%	90%	Min.	Max.	Median	Max.	Median		
Ethane	Alkane	57	100.00	7.087	2.16	3.03	7.74	12.11	1.28	21.31	4.95	6.24	4.15		
Propane	Alkane	57	100.00	7.291	0.95	2.16	10.93	17.78	0.66	48.14	4.66	8.09	9.11		
Isopentane	Alkane	57	100.00	6.254	0.85	2.05	9.78	19.14	0.68	39.91	3.66	7.29	8.43		
Butane	Alkane	57	100.00	5.836	0.67	1.44	9.20	17.70	0.35	43.98	3.24	7.39	9.48		
Pentane	Alkane	57	100.00	5.600	2.31	2.64	2.89	3.42	2.11	11.08	2.80	2.99	1.20		
Toluene	Aromatic	57	100.00	4.809	0.59	1.78	6.24	11.11	0.46	40.98	3.44	5.17	6.29		
Ethylene	Alkene	57	100.00	4.170	0.54	0.90	8.05	18.30	0.04	46.53	1.69	6.12	9.37		
Acetylene	Alkyne	57	100.00	3.654	0.89	1.54	3.22	4.21	0.56	9.31	2.43	2.65	1.59		
2-Methylpentane	Alkane	57	100.00	3.641	0.44	1.02	5.54	8.07	0.24	97.84	1.86	4.85	12.84		
Octane	Alkane	57	100.00	3.332	0.51	1.08	6.52	10.72	0.40	15.04	2.26	3.95	4.01		
Isobutane	Alkane	57	100.00	3.038	0.37	0.69	4.84	10.60	0.24	22.44	1.76	3.93	4.91		
Pentene	Alkene	53	100.00	3.056	1.43	1.67	1.80	1.88	1.26	2.21	1.73	1.73	0.17		
Chloromethane	Halogen	57	100.00	2.782	0.92	0.98	3.28	7.30	0.85	28.56	1.10	3.14	4.78		
m and p-Xylene	Aromatic	57	100.00	2.215	0.33	0.70	2.70	4.44	0.24	8.64	1.49	2.20	2.03		
Benzene	Aromatic	57	100.00	2.114	0.37	0.70	3.31	5.55	0.32	15.76	1.18	2.45	2.98		
Cyclohexane	Alkane	57	92.98	1.928	0.00	0.08	4.93	13.87	0.00	27.22	0.22	3.87	6.81		
Propylene	Alkene	57	100.00	1.892	0.20	0.37	3.88	7.22	0.10	35.75	0.78	3.14	6.03		
1-Butene/Isobutene	Alkene	57	100.00	1.827	0.31	0.48	3.08	6.40	0.26	38.50	0.76	2.87	5.69		
Hexane	Alkane	57	100.00	1.842	0.19	0.48	4.27	6.58	0.16	14.15	0.83	2.52	3.13		
3-Methylpentane	Alkane	57	100.00	1.737	0.19	0.38	3.46	5.22	0.18	42.70	0.98	2.56	5.74		
Carbonylchloride	Halogen	57	100.00	1.293	0.57	0.64	0.71	0.72	0.50	1.06	0.67	0.67	0.08		
1,1,1-Trichloroethane	Halogen	57	100.00	1.023	0.43	0.50	0.57	0.62	0.39	0.71	0.55	0.54	0.07		
Pentene	Alkene	57	100.00	0.922	0.30	0.39	0.62	0.76	0.26	1.71	0.47	0.53	0.23		
Dichloromethane	Halogen	57	100.00	0.858	0.23	0.34	0.58	0.91	0.20	2.83	0.43	0.54	0.42		
Ethylbenzene	Aromatic	57	100.00	0.830	0.14	0.28	1.33	2.10	0.10	4.10	0.54	0.90	0.88		
2,2,4-Trimethylpentane	Alkane	57	100.00	0.718	0.12	0.26	1.33	2.19	0.08	5.44	0.46	0.95	1.14		
o-Xylene	Aromatic	57	100.00	0.708	0.14	0.28	0.91	1.50	0.10	2.82	0.54	0.74	0.65		
1,2,4-Trimethylbenzene	Aromatic	57	100.00	0.749	0.14	0.26	0.92	1.35	0.10	2.82	0.46	0.69	0.58		
Methylcyclopentane	Alkane	57	100.00	0.704	0.09	0.24	1.34	2.19	0.07	3.32	0.37	0.83	0.86		
2,3-Dimethylbutane	Alkane	57	100.00	0.703	0.09	0.18	1.10	1.76	0.06	22.49	0.36	1.04	2.96		
3-Methylhexane	Alkane	57	100.00	0.685	0.12	0.28	0.82	1.27	0.10	1.90	0.42	0.60	0.45		
1-Hexene	Alkene	57	92.98	0.641	0.00	0.14	0.62	1.21	0.00	20.34	0.26	0.94	2.79		
2-Methylhexane	Alkane	57	100.00	0.614	0.10	0.21	0.80	1.36	0.03	2.09	0.34	0.61	0.55		
Heptane	Alkane	57	100.00	0.562	0.10	0.19	0.80	1.39	0.07	2.30	0.40	0.58	0.54		
2-Methyl-2-butene	Alkene	57	100.00	0.528	0.10	0.18	0.72	1.23	0.07	2.09	0.32	0.52	0.50		
Cyclohexene	Alkene	57	100.00	0.518	0.06	0.12	0.76	1.08	0.05	26.66	0.25	0.89	3.50		
3-Ethyltoluene	Aromatic	57	100.00	0.491	0.09	0.18	0.56	0.83	0.08	1.72	0.38	0.44	0.37		
2,3-Dimethylpentane	Alkane	57	100.00	0.473	0.08	0.16	0.54	0.90	0.04	1.62	0.29	0.41	0.35		
2,2-Dimethylbutane	Alkane	57	100.00	0.424	0.07	0.14	0.54	0.92	0.05	7.25	0.24	0.49	0.56		
Isoprene	Alkene	56	96.43	0.378	0.03	0.08	0.45	0.75	0.00	3.90	0.15	0.34	0.58		
Tetrachloroethylene	Halogen	57	100.00	0.373	0.08	0.14	0.32	0.62	0.07	2.54	0.22	0.34	0.41		
Naphthalene	Aromatic	57	92.98	0.364	0.00	0.13	0.51	0.85	0.00	1.20	0.25	0.34	0.30		
Pentene	Alkene	57	100.00	0.349	0.11	0.14	0.22	0.26	0.09	0.30	0.16	0.18	0.06		
Methylcyclohexane	Alkane	57	94.74	0.318	0.02	0.09	0.46	1.12	0.00	1.68	0.20	0.39	0.44		
1,3-Butadiene	Alkene	57	82.46	0.306	0.00	0.06	0.63	1.25	0.00	4.30	0.12	0.50	0.88		
cis-2-Pentene	Alkene	57	100.00	0.311	0.07	0.11	0.36	0.74	0.04	1.06	0.17	0.28	0.27		
cis-2-Butene	Alkene	57	96.49	0.297	0.04	0.08	0.48	1.13	0.00	4.40	0.12	0.44	0.72		
1-Pentene	Alkene	57	100.00	0.292	0.08	0.12	0.30	0.60	0.04	1.72	0.18	0.27	0.28		
Undecane	Alkane	57	98.25	0.291	0.04	0.08	0.36	0.66	0.00	1.10	0.20	0.27	0.26		

TABLE 44 VOC Annual Statistics at Sarnia (1997)

Unit = micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Samples >DL	% Average Mass	P E R C E N T I L E S					Max.	Median	Mean	Std. Dev.
					5%	25%	75%	90%	Min.				
3-Methylpentane	Alkane	57	94.74	0.250	0.02	0.12	0.38	0.59	0.00	0.96	0.18	0.28	0.23
Decane	Alkane	57	94.74	0.283	0.03	0.08	0.42	0.74	0.00	1.78	0.20	0.32	0.34
trans-2-Butene	Alkene	57	87.72	0.264	0.00	0.06	0.50	1.05	0.00	3.40	0.12	0.41	0.65
2,3,4-Trimethylpentane	Alkane	57	100.00	0.269	0.06	0.10	0.33	0.52	0.03	1.36	0.16	0.27	0.27
Styrene	Aromatic	56	69.64	0.724	0.00	0.00	0.40	0.94	0.00	3.27	0.12	0.38	0.67
Oxolane	Alkane	57	100.00	0.263	0.05	0.08	0.39	0.71	0.03	1.40	0.16	0.28	0.29
4-Ethyltoluene	Aromatic	57	100.00	0.259	0.05	0.10	0.26	0.43	0.04	0.86	0.17	0.23	0.18
1,3,5-Trimethylbenzene	Aromatic	57	100.00	0.249	0.04	0.08	0.32	0.51	0.04	0.88	0.16	0.23	0.19
2-Methylpentane	Alkane	56	87.50	0.244	0.00	0.09	0.34	0.66	0.00	1.03	0.19	0.26	0.25
Alkane	Alkane	57	92.98	0.242	0.00	0.10	0.42	0.69	0.00	1.40	0.15	0.27	0.28
Bromonethane	Halogen	57	100.00	0.239	0.06	0.09	0.17	0.20	0.05	0.22	0.12	0.13	0.05
2-Ethyltoluene	Aromatic	57	100.00	0.213	0.04	0.08	0.22	0.32	0.02	0.64	0.15	0.18	0.14
1,4-Diethylbenzene	Aromatic	57	96.49	0.212	0.04	0.08	0.26	0.38	0.00	0.64	0.13	0.19	0.15
2,4-Dimethylpentane	Alkane	57	92.98	0.211	0.00	0.08	0.26	0.50	0.00	0.80	0.15	0.22	0.19
2-Methyl-1-butene	Alkene	57	94.74	0.207	0.02	0.06	0.20	0.38	0.00	0.86	0.12	0.17	0.17
Chloroform	Halogen	57	100.00	0.203	0.08	0.09	0.14	0.16	0.07	0.25	0.11	0.12	0.04
Dodecane	Alkane	57	94.74	0.198	0.02	0.06	0.24	0.42	0.00	0.72	0.11	0.18	0.16
1,2,3-Trimethylbenzene	Aromatic	57	100.00	0.194	0.04	0.07	0.24	0.32	0.02	0.64	0.13	0.17	0.13
n-Propylbenzene	Aromatic	57	100.00	0.190	0.04	0.08	0.19	0.29	0.04	0.54	0.14	0.16	0.12
trans-2-Pentene	Alkene	57	100.00	0.189	0.03	0.06	0.21	0.40	0.02	1.14	0.09	0.17	0.19
2,4-Dimethylhexane	Alkane	57	92.98	0.175	0.00	0.07	0.24	0.41	0.00	0.80	0.12	0.18	0.18
Trichloroethylene	Halogen	53	100.00	0.164	0.04	0.06	0.15	0.23	0.02	0.74	0.10	0.13	0.11
1,4-Dichlorobenzene	Halogen	57	96.49	0.152	0.02	0.06	0.13	0.22	0.00	0.43	0.08	0.11	0.08
Dibromonethane	Halogen	57	85.96	0.127	0.00	0.03	0.10	0.12	0.00	0.14	0.05	0.06	0.04
1,2-Dichloroethane	Halogen	57	96.49	0.120	0.03	0.05	0.10	0.14	0.00	0.58	0.07	0.09	0.09
2,5-Dimethylhexane	Alkane	57	82.46	0.111	0.00	0.04	0.16	0.27	0.00	0.66	0.07	0.12	0.15
Chloroethane	Halogen	57	75.44	0.112	0.00	0.04	0.11	0.12	0.00	0.28	0.07	0.07	0.05
Indane	Aromatic	57	96.49	0.100	0.02	0.04	0.10	0.15	0.00	0.30	0.07	0.08	0.06
Cyclopentene	Alkene	57	96.49	0.097	0.02	0.04	0.10	0.13	0.00	0.24	0.06	0.07	0.05
1-Methylcyclopentene	Alkene	57	96.49	0.096	0.02	0.04	0.10	0.17	0.00	0.34	0.06	0.08	0.06
cis-2-Heptene	Alkene	54	35.19	0.095	0.00	0.00	0.12	0.21	0.00	0.59	0.00	0.07	0.12
cis-1,3-Dimethylcyclohexane	Alkene	57	82.46	0.093	0.00	0.02	0.14	0.26	0.00	0.44	0.06	0.10	0.10
iso-Propylbenzene	Aromatic	57	100.00	0.091	0.02	0.04	0.08	0.15	0.02	0.18	0.06	0.07	0.05
4-Methylheptane	Alkane	56	75.00	0.086	0.00	0.01	0.16	0.24	0.00	0.30	0.06	0.09	0.09
2,2-Dimethylpropane	Alkane	57	94.74	0.081	0.01	0.03	0.08	0.15	0.00	0.20	0.05	0.06	0.05
1,1-Dichloroethylene	Halogen	57	71.93	0.080	0.00	0.00	0.07	0.08	0.00	0.10	0.04	0.04	0.03
Cyclohexane	Alkene	51	94.12	0.075	0.01	0.03	0.08	0.10	0.00	0.16	0.06	0.06	0.03
1-Methylcyclohexene	Alkene	57	84.21	0.070	0.00	0.03	0.08	0.10	0.00	0.22	0.04	0.05	0.04
Bromodichloromethane	Halogen	57	42.11	0.064	0.00	0.00	0.06	0.09	0.00	0.13	0.00	0.03	0.04
Bromochloromethane	Halogen	53	96.23	0.063	0.01	0.02	0.06	0.06	0.00	0.07	0.04	0.04	0.02
1,3-Diethylbenzene	Aromatic	57	91.23	0.061	0.00	0.02	0.08	0.14	0.00	0.26	0.04	0.06	0.06
1-Octane	Alkane	46	23.91	0.060	0.00	0.00	0.00	0.20	0.00	1.98	0.00	0.08	0.30
2,2-Dimethylhexane	Alkane	57	77.19	0.060	0.00	0.01	0.04	0.06	0.00	0.66	0.03	0.05	0.12
p-Cymene	Aromatic	57	75.44	0.057	0.00	0.02	0.08	0.10	0.00	0.18	0.04	0.05	0.04
cis-3-Methyl-2-pentene	Alkene	57	78.95	0.056	0.00	0.01	0.10	0.14	0.00	0.22	0.04	0.06	0.06
trans-2-Hexene	Alkene	57	82.46	0.055	0.00	0.01	0.10	0.16	0.00	0.48	0.04	0.07	0.09
2,2-Dimethylpentane	Alkane	57	75.44	0.055	0.00	0.01	0.10	0.15	0.00	0.22	0.05	0.06	0.06
Dibromodichloromethane	Halogen	57	63.16	0.055	0.00	0.00	0.06	0.07	0.00	0.10	0.02	0.03	0.03
Vinyltoluene	Halogen	57	61.40	0.050	0.00	0.00	0.14	0.22	0.00	0.68	0.02	0.08	0.14





TABLE 45 VOC Annual Statistics at Sincue (1997)

Unit =micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Sample >IDL	% Average Mass	P E R C E N T I L E S							Mean	Std Dev.
					5%	25%	75%	90%	Min.	Max.	Median		
Thane	Alkane	46	100.00	11.783	1.53	2.58	4.35	6.60	1.76	9.04	3.77	4.07	1.88
Front12	Halogen	46	100.00	8.888	2.41	2.59	2.82	2.99	2.16	3.55	2.66	2.71	0.34
Propane	Alkane	46	100.00	8.733	0.74	1.75	4.03	5.66	0.50	9.78	2.75	3.22	2.17
Butane	Alkane	46	100.00	6.243	0.57	0.99	3.01	3.75	0.40	9.76	2.16	2.35	1.66
Front11	Halogen	42	100.00	5.164	1.60	1.66	1.84	1.96	1.37	2.19	1.77	1.78	0.16
Isopentane	Alkane	46	100.00	4.487	0.47	1.01	1.99	2.31	0.36	4.23	1.52	1.59	0.83
Acetylene	Alkyne	46	100.00	4.383	0.56	1.01	2.01	2.25	0.47	3.52	1.52	1.53	0.68
Toluene	Aromatic	46	100.00	3.641	0.23	0.60	1.36	2.05	0.14	18.19	0.92	1.47	2.63
Chloromethane	Halogen	46	100.00	3.303	0.88	0.92	1.06	1.14	0.75	1.25	0.98	1.00	0.11
Isobutane	Alkane	46	100.00	2.879	0.13	0.38	1.37	1.65	0.14	2.92	0.92	1.04	0.62
Ethylene	Alkene	46	100.00	2.815	0.23	0.53	1.19	1.45	0.13	5.56	0.90	0.99	0.86
Pentane	Alkane	46	100.00	2.604	0.32	0.61	1.10	1.32	0.24	2.42	0.89	0.93	0.48
2-Methylpentane	Alkane	46	100.00	2.355	0.21	0.53	0.94	1.31	0.12	2.26	0.69	0.78	0.47
Carbon tetrachloride	Halogen	46	100.00	2.217	0.57	0.64	0.70	0.74	0.52	0.80	0.68	0.67	0.06
Butene	Aromatic	46	100.00	2.065	0.32	0.54	0.98	1.11	0.22	1.58	0.67	0.71	0.31
1,1,1-Trichloroethane	Halogen	46	100.00	1.837	0.44	0.53	0.60	0.64	0.44	0.65	0.56	0.55	0.06
m and p-Xylene	Aromatic	46	100.00	1.641	0.17	0.33	0.68	1.05	0.08	3.44	0.46	0.60	0.55
1-Butene/Isobutene	Alkene	46	100.00	1.409	0.31	0.39	0.53	0.66	0.22	1.02	0.45	0.48	0.14
Front22	Halogen	46	100.00	1.117	0.28	0.33	0.47	0.52	0.26	1.66	0.38	0.43	0.21
Isobutene/methane	Halogen	46	100.00	1.257	0.21	0.27	0.47	0.70	0.19	2.05	0.34	0.44	0.32
Heane	Alkane	46	100.00	1.126	0.14	0.24	0.38	0.65	0.10	1.88	0.35	0.40	0.27
3-Methylpentane	Alkane	46	100.00	0.932	0.14	0.22	0.38	0.52	0.08	1.80	0.30	0.32	0.16
Propylene	Alkene	46	93.48	0.832	0.01	0.15	0.36	0.50	0.00	1.94	0.26	0.30	0.30
Naphthalene	Aromatic	46	80.43	0.706	0.00	0.07	0.22	0.50	0.00	1.56	0.11	0.23	0.35
Thylenzene	Aromatic	46	100.00	0.683	0.07	0.14	0.28	0.42	0.06	1.26	0.20	0.25	0.20
2,2,4-Trimethylpentane	Alkane	46	100.00	0.674	0.09	0.16	0.26	0.39	0.04	0.63	0.21	0.23	0.12
o-Xylene	Aromatic	46	100.00	0.660	0.08	0.12	0.24	0.37	0.04	0.62	0.17	0.22	0.15
1,2,3-Trimethylbenzene	Aromatic	46	100.00	0.586	0.06	0.12	0.24	0.35	0.04	0.80	0.17	0.20	0.13
Front14	Halogen	46	100.00	0.556	0.11	0.12	0.22	0.25	0.09	0.78	0.14	0.17	0.06
Heptane	Alkane	46	100.00	0.497	0.08	0.10	0.21	0.30	0.04	0.52	0.14	0.18	0.10
Cyclohexane	Alkane	46	86.96	0.466	0.00	0.05	0.13	0.23	0.00	4.93	0.08	0.21	0.72
3-Methylhexane	Alkane	46	93.13	0.479	0.00	0.11	0.23	0.30	0.00	0.42	0.16	0.17	0.10
Tetraethylethylene	Halogen	46	100.00	0.467	0.08	0.11	0.20	0.22	0.06	0.47	0.14	0.16	0.07
Methylcyclopentane	Alkane	46	100.00	0.456	0.06	0.10	0.18	0.25	0.01	0.86	0.14	0.17	0.13
Fluoromethane	Halogen	46	100.00	0.418	0.06	0.07	0.16	0.18	0.06	0.28	0.10	0.12	0.06
2-Methylhexane	Alkane	46	84.78	0.400	0.00	0.08	0.22	0.27	0.00	0.40	0.16	0.15	0.11
2,3-Dimethylpentane	Alkane	46	93.48	0.398	0.02	0.04	0.16	0.25	0.00	0.36	0.12	0.13	0.08
3-Ethylhexane	Aromatic	46	100.00	0.370	0.04	0.08	0.14	0.21	0.02	0.38	0.11	0.13	0.07
2,3-Dimethylbutane	Alkane	46	95.65	0.366	0.04	0.08	0.14	0.19	0.00	0.42	0.13	0.13	0.06
2,2-Dimethylbutane	Alkane	46	100.00	0.315	0.04	0.07	0.14	0.16	0.04	0.24	0.10	0.10	0.04
Isobutadiene	Halogen	46	100.00	0.312	0.06	0.08	0.11	0.12	0.06	0.14	0.10	0.10	0.02
cis-1,3-Dichloropropene	Halogen	46	13.04	0.317	0.00	0.00	0.00	0.10	0.00	1.68	0.00	0.07	0.26
Isobutene	Alkene	46	97.83	0.300	0.04	0.06	0.13	0.15	0.00	0.76	0.10	0.10	0.05
Isoprene	Alkene	40	65.00	0.239	0.00	0.00	0.12	0.31	0.00	0.63	0.04	0.10	0.15
trans-1,3-Dichloropropene	Halogen	46	13.04	0.277	0.00	0.00	0.00	0.08	0.00	1.46	0.00	0.06	0.23
2-Methyl-2-Butene	Alkene	46	97.83	0.270	0.04	0.06	0.10	0.12	0.00	0.73	0.09	0.09	0.04
1-Hexene	Alkene	46	53.35	0.274	0.00	0.00	0.16	0.21	0.00	0.46	0.07	0.09	0.10

TABLE 45 VOC Annual Statistics at Sincore (1997)

Unit =microgram/m<sup>3</sup>

Compounds Name	Compound Class	No. of Samples	% Sample >IDL	% Average Mass	P E R C E N T I L E S					Median	Mean	Std. Dev.
					5%	25%	75%	90%	Min.			
None	Alkane	46	95.65	0.261	0.03	0.06	0.10	0.14	0.00	0.08	0.09	0.05
Cyclopentane	Alkane	46	89.13	0.256	0.00	0.07	0.11	0.15	0.00	0.24	0.08	0.09
Cyclohexane	Alkane	46	95.65	0.257	0.04	0.06	0.10	0.15	0.00	0.24	0.08	0.09
Undecane	Alkane	46	95.65	0.246	0.03	0.06	0.10	0.12	0.00	0.20	0.08	0.04
1-Pentene	Alkene	46	89.13	0.225	0.00	0.05	0.10	0.11	0.00	0.44	0.08	0.07
Methylcyclohexane	Alkane	46	80.43	0.222	0.00	0.04	0.13	0.16	0.00	0.28	0.08	0.08
2,3,4-Trimethylpentane	Alkane	46	89.13	0.224	0.00	0.06	0.10	0.13	0.00	0.26	0.08	0.05
4-Ethyltoluene	Aromatic	46	100.00	0.223	0.03	0.05	0.08	0.12	0.02	0.22	0.07	0.08
Trihaloethylene	Halogen	42	100.00	0.209	0.03	0.05	0.10	0.14	0.02	0.22	0.07	0.08
2-Fluorobenzene	Aromatic	46	100.00	0.208	0.02	0.04	0.07	0.11	0.02	0.24	0.06	0.07
3-Methylpentane	Alkane	46	69.57	0.206	0.00	0.00	0.12	0.14	0.00	0.23	0.08	0.06
1,3,5-Trimethylbenzene	Aromatic	46	100.00	0.200	0.02	0.04	0.08	0.12	0.02	0.28	0.06	0.07
Dibromomethane	Halogen	46	93.48	0.199	0.01	0.03	0.10	0.12	0.00	0.14	0.04	0.06
2-Methylpentane	Alkane	45	73.33	0.188	0.00	0.00	0.10	0.18	0.00	0.22	0.07	0.08
Chloroethane	Halogen	46	82.61	0.184	0.00	0.03	0.08	0.11	0.00	0.17	0.04	0.06
Iodobenzene	Alkane	46	89.13	0.183	0.00	0.04	0.08	0.10	0.00	0.18	0.06	0.06
n-Propylbenzene	Aromatic	46	100.00	0.177	0.02	0.04	0.08	0.10	0.02	0.12	0.06	0.03
1,2-Dichloroethane	Halogen	46	97.83	0.175	0.02	0.03	0.08	0.08	0.00	0.10	0.05	0.02
cis-2-Pentene	Alkene	46	82.61	0.172	0.00	0.04	0.08	0.10	0.00	0.18	0.06	0.04
1,2,3-Trimethylbenzene	Aromatic	46	97.83	0.161	0.02	0.04	0.06	0.08	0.00	0.18	0.05	0.03
2,4-Dimethylpentane	Alkane	46	82.61	0.159	0.00	0.04	0.08	0.11	0.00	0.20	0.06	0.06
1,4-Dichlorobenzene	Aromatic	46	86.96	0.160	0.00	0.04	0.07	0.09	0.00	0.18	0.06	0.05
cis-2-Butene	Alkene	46	71.74	0.127	0.00	0.00	0.06	0.08	0.00	0.14	0.04	0.04
2,4-Dimethylhexane	Alkane	46	73.91	0.122	0.00	0.01	0.08	0.10	0.00	0.12	0.04	0.04
2-Methyl-1-Butene	Alkene	46	69.57	0.121	0.00	0.00	0.06	0.14	0.00	0.22	0.02	0.05
1,1-Dichloroethylene	Halogen	46	43.48	0.108	0.00	0.00	0.08	0.08	0.00	0.10	0.00	0.03
2,2-Dimethylpropane	Alkane	46	84.78	0.104	0.00	0.02	0.06	0.06	0.00	0.10	0.03	0.02
Bromoforn	Halogen	42	95.24	0.101	0.01	0.02	0.06	0.06	0.00	0.06	0.03	0.02
1,4-Dichlorobenzene	Halogen	46	95.65	0.099	0.01	0.02	0.04	0.06	0.00	0.06	0.03	0.02
Iodane	Aromatic	46	95.65	0.098	0.01	0.02	0.04	0.06	0.00	0.08	0.03	0.02
Bromodichloromethane	Halogen	46	45.65	0.096	0.00	0.00	0.06	0.08	0.00	0.10	0.00	0.03
iso-Propylbenzene	Aromatic	46	100.00	0.090	0.02	0.02	0.04	0.04	0.01	0.08	0.03	0.01
trans-2-Butene	Alkene	46	47.83	0.080	0.00	0.00	0.06	0.08	0.00	0.12	0.00	0.03
Dibromochloromethane	Halogen	46	45.65	0.081	0.00	0.00	0.04	0.06	0.00	0.10	0.00	0.02
2,5-Dimethylhexane	Alkane	46	65.22	0.076	0.00	0.00	0.04	0.06	0.00	0.15	0.03	0.03
trans-2-Pentene	Alkene	46	80.43	0.076	0.00	0.02	0.04	0.04	0.00	0.10	0.03	0.02
Styrene	Aromatic	40	40.00	0.075	0.00	0.00	0.05	0.11	0.00	0.22	0.00	0.03
trans-4-Methyl-2-pentene	Alkene	46	21.74	0.065	0.00	0.00	0.00	0.10	0.00	0.31	0.00	0.03
cis-1,3-Dimethylcyclohexane	Alkane	46	65.22	0.071	0.00	0.00	0.04	0.06	0.00	0.08	0.02	0.03
1,3-Butadiene	Alkene	46	45.65	0.071	0.00	0.00	0.04	0.06	0.00	0.14	0.00	0.02
1,1,2,2-Tetrahaloethane	Halogen	46	43.48	0.071	0.00	0.00	0.04	0.06	0.00	0.07	0.00	0.02
1-Methylcyclopentene	Alkene	46	71.74	0.068	0.00	0.00	0.04	0.04	0.00	0.07	0.02	0.02
trans-1,2-Dichloroethylene	Halogen	46	45.65	0.069	0.00	0.00	0.04	0.06	0.00	0.06	0.00	0.02
Cyclohexene	Alkene	41	58.54	0.067	0.00	0.00	0.04	0.06	0.00	0.08	0.02	0.02
Cyclopentene	Alkene	46	60.87	0.061	0.00	0.00	0.04	0.04	0.00	0.06	0.02	0.02
1,1-Dichloroethane	Halogen	46	41.30	0.061	0.00	0.00	0.04	0.04	0.00	0.06	0.00	0.02
4-Methylpentane	Alkane	46	39.13	0.055	0.00	0.00	0.04	0.07	0.00	0.11	0.00	0.02
1-Methylcyclohexene	Alkene	46	52.17	0.056	0.00	0.00	0.04	0.05	0.00	0.10	0.01	0.02

TABLE 45 VOC Annual Statistics at Simcoe (1997)

Unit = micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Samples >DL	% Average Mass	P E R C E N T I L E S							Mean	Std. Dev.
					5%	25%	75%	90%	Min.	Max.	Median		
cis-3-Methyl-2-pentene	Alkene	46	21.74	0.053	0.00	0.00	0.00	0.02	0.00	0.72	0.00	0.01	0.03
2,2-Dimethylhexane	Alkane	46	36.96	0.052	0.00	0.00	0.02	0.04	0.00	0.15	0.00	0.02	0.03
cis-1,2-Dichloroethylene	Halogen	46	41.30	0.051	0.00	0.00	0.04	0.04	0.00	0.06	0.00	0.02	0.02
Trifluoromide	Halogen	46	34.78	0.047	0.00	0.00	0.02	0.04	0.00	0.06	0.00	0.01	0.02
p-Cymene	Aromatic	46	36.96	0.045	0.00	0.00	0.02	0.05	0.00	0.09	0.00	0.01	0.02
Chlorobenzene	Halogen	42	47.62	0.038	0.00	0.00	0.03	0.04	0.00	0.04	0.00	0.02	0.02
1,3-Diethylbenzene	Aromatic	46	60.87	0.037	0.00	0.00	0.02	0.04	0.00	0.04	0.01	0.01	0.01
1,2-Dichloropropane	Halogen	46	19.57	0.037	0.00	0.00	0.00	0.05	0.00	0.08	0.00	0.01	0.02
2,2-Dimethylpentane	Alkane	46	52.17	0.035	0.00	0.00	0.02	0.04	0.00	0.06	0.01	0.01	0.02
cis-4-Methyl-2-pentene	Alkene	46	26.09	0.033	0.00	0.00	0.02	0.06	0.00	0.10	0.00	0.01	0.03
HHB	Halogen	46	19.57	0.034	0.00	0.00	0.00	0.06	0.00	0.08	0.00	0.01	0.02
trans-2-Octene	Alkene	46	23.91	0.034	0.00	0.00	0.00	0.05	0.00	0.12	0.00	0.01	0.03
sec-Butylbenzene	Aromatic	46	63.04	0.032	0.00	0.00	0.02	0.02	0.00	0.02	0.01	0.01	0.01
iso-Butylbenzene	Aromatic	46	58.70	0.031	0.00	0.00	0.02	0.02	0.00	0.04	0.01	0.01	0.01
trans-1,2-Dimethylcyclohexane	Alkane	46	39.13	0.028	0.00	0.00	0.02	0.03	0.00	0.06	0.00	0.01	0.02
n-Butylbenzene	Aromatic	46	47.83	0.024	0.00	0.00	0.02	0.02	0.00	0.04	0.00	0.01	0.01
2,2,5-Trimethylhexane	Alkane	46	17.39	0.021	0.00	0.00	0.00	0.04	0.00	0.06	0.00	0.01	0.02
1,2-Diethylbenzene	Aromatic	46	30.43	0.021	0.00	0.00	0.02	0.03	0.00	0.04	0.00	0.01	0.01
trans-2-Hexene	Alkene	46	39.13	0.020	0.00	0.00	0.02	0.02	0.00	0.04	0.00	0.01	0.01
1-Octene	Alkene	41	9.76	0.019	0.00	0.00	0.00	0.02	0.00	0.04	0.00	0.01	0.01
cis-2-Heptene	Alkene	46	6.52	0.019	0.00	0.00	0.00	0.00	0.00	0.15	0.00	0.01	0.04
1,1,2-Trichloroethane	Halogen	46	10.87	0.019	0.00	0.00	0.00	0.02	0.00	0.12	0.00	0.01	0.03
trans-1,4-Dimethylcyclohexane	Alkane	46	28.26	0.016	0.00	0.00	0.01	0.02	0.00	0.10	0.00	0.01	0.02
1-Heptene	Alkene	46	2.17	0.012	0.00	0.00	0.00	0.00	0.00	0.05	0.00	0.01	0.01
cis-1,4-1,3-Dimethylcyclohexane	Alkene	46	28.26	0.012	0.00	0.00	0.00	0.01	0.00	0.18	0.00	0.00	0.03
cis-2-Octene	Alkene	46	10.87	0.008	0.00	0.00	0.00	0.01	0.00	0.03	0.00	0.00	0.01
Vinylchloride	Halogen	46	10.87	0.007	0.00	0.00	0.00	0.01	0.00	0.05	0.00	0.00	0.01
trans-2-Heptene	Alkene	46	4.35	0.007	0.00	0.00	0.00	0.00	0.00	0.04	0.00	0.00	0.01
4-Methyl-1-pentene	Alkene	46	2.17	0.005	0.00	0.00	0.00	0.00	0.00	0.10	0.00	0.00	0.01
2-Methyl-1-butene	Alkene	46	19.57	0.004	0.00	0.00	0.00	0.01	0.00	0.09	0.00	0.00	0.01
cis-2-Hexene	Alkene	46	6.52	0.004	0.00	0.00	0.00	0.00	0.00	0.01	0.00	0.00	0.00
1,4-Dichlorobutane	Halogen	46	2.17	0.004	0.00	0.00	0.00	0.00	0.00	0.04	0.00	0.00	0.01
1-Isoprene	Alkene	40	2.50	0.003	0.00	0.00	0.00	0.00	0.00	0.04	0.00	0.00	0.01
trans-3-Methyl-2-pentene	Alkene	46	4.35	0.003	0.00	0.00	0.00	0.00	0.00	0.06	0.00	0.00	0.01
3-Methyl-1-pentene	Alkene	46	2.17	0.002	0.00	0.00	0.00	0.00	0.00	0.04	0.00	0.00	0.01
3,6-Dimethylheptane	Alkane	46	4.35	0.001	0.00	0.00	0.00	0.00	0.00	0.04	0.00	0.00	0.01
2,2,3-Trimethylpentane	Alkane	46	2.17	0.000	0.00	0.00	0.00	0.00	0.00	0.02	0.00	0.00	0.00
Hexachlorobutene	Halogen	46	2.17	0.000	0.00	0.00	0.00	0.00	0.00	0.01	0.00	0.00	0.00
1,3-Dichlorobenzene	Halogen	46	2.17	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1-Butyne	Alkyne	46	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
trans-3-Heptene	Alkene	46	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
cis-3-Heptene	Alkene	46	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1-Nonene	Alkene	35	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
tert-Butylbenzene	Aromatic	46	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Hexylbenzene	Aromatic	46	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Bromodichloromethane	Halogen	46	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,2-Dichlorobenzene	Halogen	46	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,2,4-Trichlorobenzene	Halogen	46	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

TABLE 46 VOC Annual Statistics at Stouffville (1997)

Unit = micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Sample > DL	% Average Mass	P E R C E N T I L E S							Median	Mean	Std. Dev.
					5%	25%	75%	90%	Min.	Max.	Max.			
Butane	Alkane	58	100.0	8.136	0.62	1.45	6.02	11.21	0.42	269.54	289	1.69	39.45	
Ethane	Alkane	58	100.0	7.247	1.40	2.37	4.31	5.61	0.10	8.33	3.19	3.51	1.65	
Propane	Alkane	58	100.0	7.221	1.29	2.13	5.02	7.13	0.66	21.30	3.29	4.06	3.21	
Alkane	Alkane	58	100.0	6.616	0.69	1.50	5.31	10.45	0.50	244.50	2.41	8.77	32.31	
Isopentane	Alkane	58	100.0	5.991	2.20	2.52	2.79	2.87	2.08	4.25	2.67	2.66	0.31	
Freon12	Halogen	58	100.0	5.997	0.94	1.60	4.16	6.10	0.71	107.10	2.69	4.99	13.84	
Toluene	Aromatic	58	100.0	4.109	0.74	1.30	2.62	3.76	0.51	6.87	2.14	2.17	1.16	
Acetylene	Alkyne	58	100.0	3.671	0.47	0.94	2.75	5.92	0.32	127.85	1.43	4.56	16.74	
Pentane	Alkane	58	100.0	3.666	1.53	1.64	1.79	1.85	1.50	1.96	1.72	1.72	0.12	
Freon11	Halogen	55	100.0	3.305	0.44	0.78	2.17	6.06	0.32	53.16	1.27	3.51	8.77	
Isobutane	Alkane	58	100.0	3.171	0.38	1.01	2.09	2.91	0.42	5.71	1.42	1.66	0.99	
Ethylene	Alkene	58	100.0	2.659	0.30	0.74	1.72	3.30	0.22	65.90	1.29	2.62	8.55	
2-Methylpentane	Alkane	58	100.0	2.537	0.35	0.60	2.20	3.52	0.22	25.55	1.11	1.92	3.41	
m and p-Xylene	Aromatic	58	100.0	2.295	0.87	0.97	1.06	1.10	0.75	1.25	1.02	1.01	0.09	
Chloromethane	Halogen	58	100.0	1.933	0.35	0.68	1.33	1.71	0.30	19.16	0.96	1.36	2.44	
Benzene	Aromatic	58	100.0	1.741	0.34	0.60	1.05	1.43	0.28	9.91	0.79	1.07	1.36	
1-Butene/Isobutene	Alkene	58	100.0	1.537	0.56	0.64	0.72	0.74	0.56	0.82	0.68	0.67	0.06	
Carbon tetrachloride	Halogen	58	100.0	1.334	0.49	0.54	0.62	0.67	0.46	0.77	0.59	0.59	0.07	
1,1,1-Trichloroethane	Halogen	58	100.0	1.233	0.16	0.32	0.93	1.65	0.14	41.89	0.49	1.45	5.41	
Hexane	Alkane	58	100.0	1.229	0.22	0.30	0.77	1.35	0.21	23.54	0.48	1.03	3.05	
Dichloromethane	Halogen	58	100.0	1.183	0.20	0.30	0.84	1.46	0.14	43.69	0.52	1.46	5.69	
3-Methylpentane	Alkane	58	100.0	0.991	0.33	0.38	0.52	0.63	0.27	0.89	0.44	0.46	0.12	
Freon22	Halogen	58	100.0	0.961	0.21	0.31	0.65	1.06	0.11	2.18	0.42	0.56	0.41	
Propylene	Alkene	58	100.0	0.899	0.14	0.23	0.66	0.98	0.10	5.84	0.42	0.67	1.28	
Ethylbenzene	Aromatic	58	100.0	0.881	0.16	0.26	0.57	0.90	0.13	10.92	0.37	0.64	1.41	
2,2,4-Trimethylpentane	Alkane	58	100.0	0.801	0.12	0.21	0.69	1.05	0.08	7.57	0.36	0.59	1.00	
o-Xylene	Aromatic	58	100.0	0.718	0.11	0.18	0.59	0.82	0.10	5.37	0.31	0.51	0.75	
1,2,4-Trimethylbenzene	Aromatic	58	100.0	0.698	0.13	0.23	0.45	0.63	0.07	1.82	0.28	0.38	0.30	
Tetrachloroethylene	Halogen	58	100.0	0.662	0.12	0.18	0.52	0.67	0.09	13.65	0.30	0.59	1.76	
3-Methylhexane	Alkane	58	100.0	0.660	0.09	0.16	0.46	0.66	0.04	14.91	0.27	0.60	1.93	
2-Methylhexane	Alkane	58	100.0	0.594	0.10	0.16	0.39	0.68	0.09	9.76	0.24	0.49	1.27	
Heptane	Alkane	58	100.0	0.573	0.08	0.15	0.42	0.68	0.06	21.58	0.25	0.71	2.80	
Methylcyclopentane	Alkane	58	100.0	0.561	0.08	0.12	0.33	0.86	0.07	28.66	0.17	0.86	3.75	
2-Methyl-2-butene	Alkene	58	100.0	0.497	0.08	0.12	0.37	0.65	0.06	16.75	0.22	0.59	2.18	
2,3-Dimethylbutane	Alkene	58	100.0	0.453	0.08	0.12	0.36	0.49	0.06	5.41	0.21	0.35	0.71	
3-Ethyltoluene	Aromatic	58	100.0	0.432	0.08	0.11	0.30	0.41	0.06	6.20	0.22	0.34	0.80	
2,3-Dimethylpentane	Alkane	58	100.0	0.411	0.06	0.10	0.28	0.38	0.04	3.45	0.16	0.26	0.45	
Decane	Alkane	58	100.0	0.409	0.00	0.08	0.27	0.52	0.00	1.56	0.15	0.24	0.28	
Naphthalene	Aromatic	58	93.10	0.404	0.11	0.12	0.22	0.24	0.09	0.28	0.18	0.18	0.05	
Freon114	Halogen	58	100.0	0.390	0.06	0.10	0.28	0.47	0.04	12.56	0.17	0.45	1.64	
Cyclopentane	Alkane	58	100.0	0.385	0.00	0.14	0.28	0.36	0.00	4.05	0.18	0.26	0.32	
1-Hexane	Alkane	58	86.21	0.364	0.04	0.10	0.24	0.37	0.02	2.35	0.14	0.22	0.32	
Undecane	Alkane	58	100.0	0.339	0.04	0.06	0.22	0.41	0.02	0.85	0.10	0.18	0.19	
Isoprene	Alkene	56	100.0	0.332	0.04	0.08	0.22	0.48	0.00	10.78	0.12	0.39	1.41	
cis-2-Pentene	Alkene	58	98.28	0.325	0.06	0.10	0.22	0.31	0.05	6.19	0.14	0.29	0.80	
2,2-Dimethylbutane	Alkane	58	100.0	0.299	0.04	0.08	0.20	0.32	0.00	4.04	0.13	0.24	0.54	
Methylcyclohexane	Alkane	58	96.55	0.303	0.06	0.08	0.23	0.42	0.00	8.08	0.12	0.31	1.05	
1-Pentene	Alkene	58	98.28	0.299	0.06	0.10	0.20	0.33	0.04	4.73	0.14	0.24	0.61	
2,3,4-Trimethylpentane	Alkane	58	100.0											



TABLE 46 VOC Annual Statistics at Stouffville (1997)

Unit—micrograms/m<sup>3</sup>

Compounds	Compound Class	No. of Samples	% Samples >IDL	% Average Mass	P E R C E N T I L E S						Max.	Median	Mean	Std. Dev.
					5%	25%	75%	90%	Min.					
Bromomethane	Halogen	58	100.00	0.292	0.06	0.08	0.16	0.18	0.05	0.36	0.13	0.13	0.05	
Octane	Alkane	58	100.00	0.287	0.05	0.08	0.18	0.27	0.03	2.71	0.12	0.20	0.36	
cis-2-Butene	Alkene	58	96.55	0.282	0.03	0.06	0.21	0.48	0.00	9.84	0.10	0.36	1.30	
Nonane	Alkane	58	96.55	0.282	0.04	0.08	0.18	0.27	0.00	1.52	0.11	0.18	0.23	
3-Methylpentane	Alkane	58	86.21	0.277	0.00	0.06	0.21	0.37	0.00	5.76	0.14	0.25	0.75	
2-Methylpentane	Alkane	56	71.43	0.266	0.00	0.00	0.15	0.24	0.00	5.99	0.09	0.21	0.79	
Cyclohexane	Alkane	58	96.55	0.265	0.04	0.08	0.20	0.27	0.00	4.47	0.12	0.21	0.38	
trans-2-Butene	Alkene	58	91.38	0.257	0.00	0.06	0.18	0.44	0.00	9.10	0.10	0.34	1.21	
4-Ethyltoluene	Aromatic	58	100.00	0.251	0.03	0.07	0.19	0.26	0.04	2.65	0.12	0.19	0.34	
Trichloroethylene	Halogen	55	98.18	0.246	0.03	0.06	0.18	0.30	0.00	0.80	0.10	0.15	0.15	
1,3,5-Trinitrobenzene	Aromatic	58	100.00	0.237	0.04	0.06	0.19	0.28	0.02	2.18	0.11	0.17	0.29	
1,4-Diethylbenzene	Aromatic	58	100.00	0.228	0.04	0.06	0.18	0.23	0.04	1.04	0.10	0.14	0.15	
Chloroform	Halogen	58	100.00	0.216	0.07	0.08	0.11	0.13	0.06	0.14	0.10	0.10	0.02	
2-Ethyltoluene	Aromatic	58	100.00	0.214	0.04	0.06	0.16	0.22	0.03	1.29	0.10	0.14	0.18	
2,4-Dimethylpentane	Alkane	58	94.83	0.209	0.02	0.06	0.16	0.23	0.00	4.72	0.10	0.20	0.61	
trans-2-Pentene	Alkene	58	100.00	0.203	0.02	0.04	0.12	0.23	0.01	14.73	0.07	0.38	1.93	
1,2,3-Trinitrobenzene	Aromatic	58	100.00	0.195	0.04	0.06	0.15	0.21	0.02	1.10	0.09	0.13	0.16	
Dodecane	Alkane	58	93.10	0.193	0.00	0.06	0.12	0.19	0.00	0.41	0.09	0.11	0.08	
1-Decene	Alkene	53	9.43	0.186	0.00	0.00	0.00	0.00	0.00	7.48	0.00	0.20	1.04	
n-Propylbenzene	Aromatic	58	100.00	0.181	0.04	0.05	0.13	0.17	0.03	1.71	0.08	0.13	0.22	
2-Methyl-1-Butene	Alkene	58	87.93	0.181	0.00	0.03	0.14	0.21	0.00	10.98	0.08	0.28	1.43	
2,4-Dimethylhexane	Alkane	58	93.10	0.179	0.00	0.06	0.13	0.20	0.00	3.06	0.08	0.15	0.39	
Chloroethane	Halogen	58	94.83	0.164	0.03	0.06	0.10	0.12	0.00	0.16	0.08	0.08	0.04	
2,5-Dimethyltoluene	Alkane	58	93.10	0.159	0.00	0.04	0.10	0.14	0.00	1.90	0.08	0.11	0.24	
Dibromomethane	Halogen	58	96.55	0.160	0.02	0.05	0.10	0.12	0.00	0.16	0.07	0.07	0.04	
Styrene	Aromatic	54	64.81	0.147	0.00	0.00	0.14	0.22	0.00	0.53	0.06	0.09	0.11	
1,3-Butadiene	Alkene	58	75.86	0.123	0.00	0.03	0.10	0.20	0.00	0.74	0.06	0.09	0.11	
1,4-Dichlorobenzene	Halogen	58	100.00	0.121	0.02	0.04	0.08	0.10	0.01	0.22	0.05	0.06	0.04	
1,2-Dichloroethane	Halogen	58	94.83	0.121	0.02	0.04	0.08	0.08	0.00	0.20	0.06	0.06	0.03	
Indane	Aromatic	58	100.00	0.114	0.02	0.04	0.08	0.11	0.02	0.68	0.05	0.07	0.09	
iso-Propylbenzene	Aromatic	58	100.00	0.111	0.02	0.04	0.07	0.08	0.02	0.43	0.05	0.06	0.06	
cis-1,3-Dimethylcyclohexane	Alkane	58	86.21	0.109	0.00	0.02	0.08	0.17	0.00	0.97	0.04	0.08	0.14	
1-Methylcyclopentane	Alkene	58	94.83	0.097	0.01	0.03	0.06	0.13	0.00	3.82	0.04	0.12	0.50	
p-Cymene	Aromatic	58	84.48	0.093	0.00	0.02	0.06	0.10	0.00	1.16	0.04	0.07	0.15	
Cyclopentane	Alkene	58	94.83	0.092	0.01	0.03	0.06	0.10	0.00	2.94	0.04	0.10	0.38	
2,2-Dimethylpropane	Alkane	58	91.38	0.089	0.00	0.03	0.06	0.08	0.00	1.40	0.04	0.07	0.18	
1,1-Dichloroethylene	Halogen	58	65.52	0.090	0.00	0.00	0.06	0.08	0.00	0.10	0.04	0.04	0.03	
4-Methylpentane	Alkane	56	69.64	0.083	0.00	0.00	0.07	0.12	0.00	0.38	0.04	0.05	0.07	
Bromoform	Halogen	55	98.18	0.075	0.02	0.02	0.05	0.06	0.00	0.08	0.04	0.04	0.02	
Bromodichloromethane	Halogen	58	50.00	0.073	0.00	0.00	0.06	0.08	0.00	0.10	0.01	0.03	0.03	
Dibromochloromethane	Halogen	58	63.79	0.072	0.00	0.00	0.05	0.06	0.00	0.08	0.03	0.03	0.03	
1-Methylcyclohexene	Alkene	58	72.41	0.068	0.00	0.00	0.06	0.08	0.00	0.51	0.04	0.04	0.07	
Cyclohexene	Alkene	53	83.02	0.065	0.00	0.02	0.06	0.06	0.00	0.80	0.04	0.05	0.11	
1,1-Dichloroethane	Halogen	58	72.41	0.063	0.00	0.00	0.04	0.06	0.00	0.21	0.03	0.03	0.03	
1,2-Diethylbenzene	Aromatic	58	91.38	0.059	0.00	0.02	0.04	0.06	0.00	0.21	0.02	0.04	0.03	
2,2-Dimethylpentane	Alkane	58	75.86	0.054	0.00	0.01	0.05	0.08	0.00	1.24	0.03	0.05	0.16	
1,1,2,2-Tetrachloroethane	Halogen	58	56.90	0.055	0.00	0.00	0.04	0.06	0.00	0.06	0.02	0.02	0.02	
trans-4-Methyl-2-pentene	Alkene	58	24.14	0.054	0.00	0.00	0.00	0.15	0.00	0.68	0.00	0.05	0.13	
trans-2-Hexene	Alkene	58	75.86	0.052	0.00	0.01	0.04	0.07	0.00	3.12	0.02	0.08	0.41	

TABLE 46 VOC Annual Statistics at Stouffville (1997)






Unit = micrograms/m<sup>3</sup>

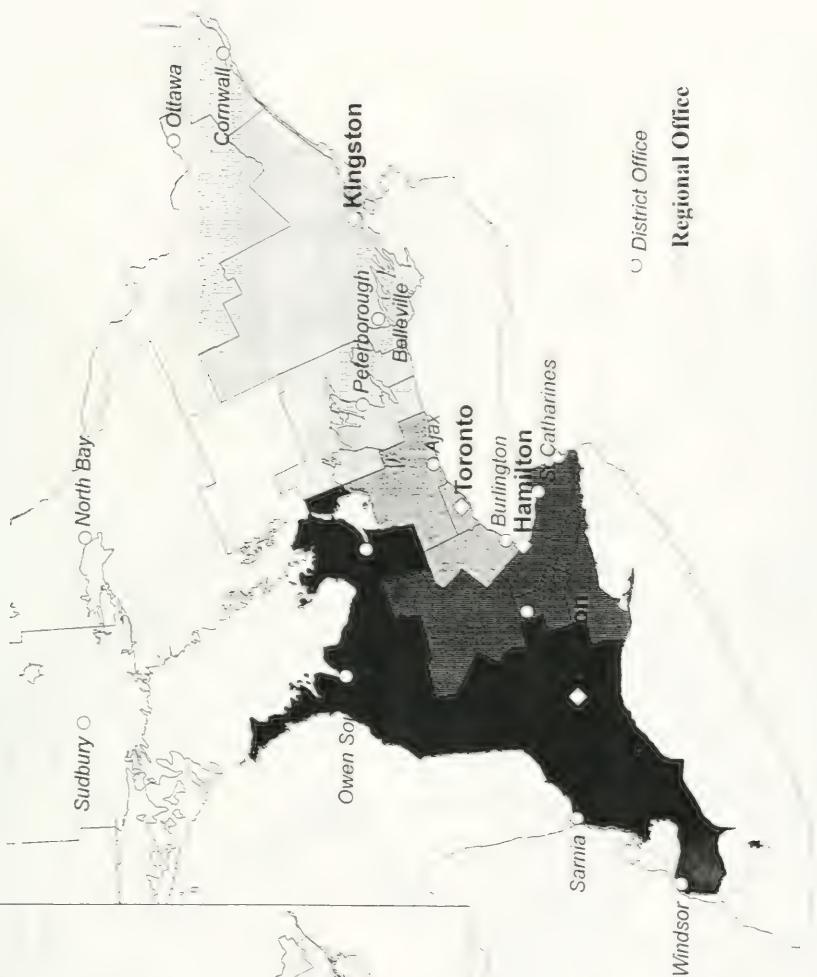
Compounds	Compound Class	No. of Samples	% Samples >DL	% Average Mass	P E R C E N T I L E S					Max.	Median	Mean	Std. Dev.
					5%	25%	75%	90%	Min.				
trans-1,2-Dimethylcyclohexane	Alkane	58	53.45	(0.95)	0.00	0.00	0.05	0.10	0.00	0.44	0.02	0.04	0.07
Benzylchloride	Halogen	55	60.00	0.049	0.00	0.00	0.05	0.06	0.00	0.06	0.03	0.03	0.02
2,2-Dimethylhexane	Alkane	58	68.97	0.047	0.00	0.00	0.03	0.04	0.00	0.33	0.02	0.03	0.05
n-Butylbenzene	Aromatic	58	82.76	0.046	0.00	0.01	0.04	0.06	0.00	0.24	0.02	0.03	0.04
cis-3-Methyl-2-pentene	Alkene	58	65.07	0.046	0.00	0.00	0.04	0.06	0.00	3.17	0.02	0.08	0.41
EDB	Halogen	58	39.66	0.045	0.00	0.00	0.04	0.06	0.00	0.08	0.00	0.02	0.03
trans-2-Octene	Alkene	58	43.10	0.045	0.00	0.00	0.05	0.08	0.00	0.47	0.00	0.04	0.07
trans-1,2-Dichloroethylene	Halogen	58	55.17	0.045	0.00	0.00	0.04	0.05	0.00	0.66	0.02	0.02	0.02
cis-4-Methyl-2-pentene	Alkene	58	29.31	0.040	0.00	0.00	0.02	0.11	0.00	0.45	0.00	0.03	0.08
cis-1,2-Dichloroethylene	Halogen	58	51.72	0.039	0.00	0.00	0.04	0.04	0.00	0.06	0.02	0.02	0.02
1,2-Dichloropropane	Halogen	58	37.93	0.037	0.00	0.00	0.03	0.06	0.00	0.08	0.00	0.02	0.02
sec-Butylbenzene	Aromatic	58	81.03	0.036	0.00	0.01	0.02	0.04	0.00	0.08	0.02	0.02	0.02
trans-1,4-Dimethylcyclohexane	Alkane	58	48.28	0.034	0.00	0.00	0.03	0.06	0.00	0.18	0.00	0.02	0.04
cis-2-Heptene	Alkene	58	20.69	0.034	0.00	0.00	0.00	0.08	0.00	0.13	0.00	0.02	0.03
iso-Butylbenzene	Aromatic	58	77.59	0.032	0.00	0.01	0.02	0.03	0.00	0.07	0.02	0.02	0.01
1,1,2-Trichloroethane	Halogen	58	32.76	0.031	0.00	0.00	0.03	0.05	0.00	0.18	0.00	0.02	0.03
Ethylbenzene	Halogen	58	41.38	0.029	0.00	0.00	0.03	0.04	0.00	0.06	0.00	0.01	0.02
2,2,5-Trimethylhexane	Alkane	58	34.48	0.027	0.00	0.00	0.03	0.06	0.00	0.08	0.00	0.02	0.02
1-Heptene	Alkene	55	5.45	0.024	0.00	0.00	0.00	0.00	0.00	0.23	0.00	0.01	0.04
1,2-Dibutylbenzene	Aromatic	58	55.17	0.022	0.00	0.00	0.02	0.03	0.00	0.06	0.01	0.01	0.01
trans-3-Methyl-2-pentene	Alkene	58	29.31	0.022	0.00	0.00	0.03	0.06	0.00	2.37	0.00	0.06	0.31
cis-1,4-1,3-Dimethylcyclohexane	Alkane	58	44.83	0.022	0.00	0.00	0.02	0.05	0.00	0.40	0.00	0.02	0.06
cis-2-Octene	Alkene	58	18.97	0.021	0.00	0.00	0.00	0.05	0.00	0.22	0.00	0.01	0.04
3-Methyl-1-pentene	Alkene	58	25.86	0.019	0.00	0.00	0.02	0.06	0.00	0.10	0.00	0.01	0.03
3,6-Dimethylcyclohexane	Alkane	58	37.93	0.019	0.00	0.00	0.02	0.04	0.00	0.20	0.00	0.02	0.04
cis-2-Hexene	Alkene	58	36.21	0.019	0.00	0.00	0.02	0.05	0.00	2.54	0.00	0.06	0.33
1-Octene	Alkene	50	22.00	0.015	0.00	0.00	0.00	0.04	0.00	0.14	0.00	0.01	0.03
2-Ethyl-1-Hexene	Alkene	58	39.66	0.014	0.00	0.00	0.01	0.03	0.00	0.15	0.00	0.01	0.02
1-Styrene	Alkene	46	17.39	0.013	0.00	0.00	0.00	0.05	0.00	0.08	0.00	0.01	0.02
cis-3-Heptene	Alkene	55	3.64	0.012	0.00	0.00	0.00	0.00	0.00	0.61	0.00	0.01	0.08
4-Methyl-1-pentene	Alkene	58	18.97	0.011	0.00	0.00	0.00	0.04	0.00	0.07	0.00	0.01	0.02
trans-2-Heptene	Alkene	58	32.76	0.011	0.00	0.00	0.02	0.02	0.00	0.03	0.00	0.01	0.01
Vinylchloride	Halogen	58	29.31	0.011	0.00	0.00	0.02	0.02	0.00	0.04	0.00	0.01	0.01
tert-Butylbenzene	Aromatic	58	15.52	0.005	0.00	0.00	0.00	0.01	0.00	0.04	0.00	0.00	0.01
2,2,3-Trimethylbutane	Alkane	58	15.52	0.004	0.00	0.00	0.00	0.02	0.00	0.04	0.00	0.00	0.01
1-Butyne	Alkyne	58	5.17	0.003	0.00	0.00	0.00	0.00	0.00	0.04	0.00	0.00	0.01
trans-3-Heptene	Alkene	57	8.77	0.001	0.00	0.00	0.00	0.00	0.00	0.01	0.00	0.00	0.00
cis-1,3-Dichloropropene	Halogen	58	1.72	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Heptylbenzene	Aromatic	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
trans-1,3-Dichloropropene	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Bromochlorodimethane	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Chlorobenzene	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,4-Dichlorobutane	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,5-Dichlorobenzene	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,2-Dichlorobenzene	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
1,2,4-Trichlorobenzene	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
Hexachlorobutadiene	Halogen	58	0.00	0.000	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00

# MAP1 Location of Provincial Regional Boundaries (1997)



## Regions

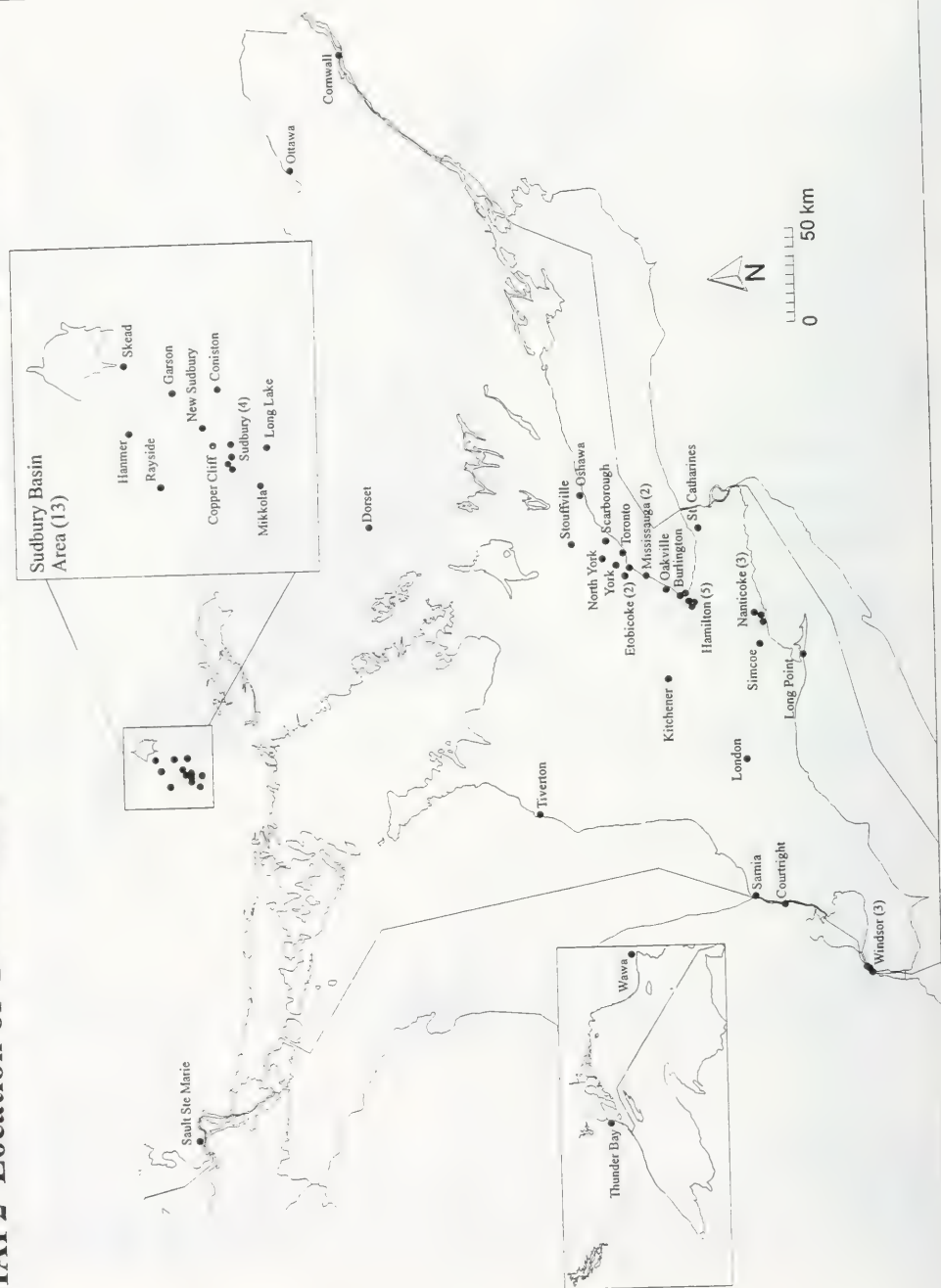
-  Central
-  West Central
-  Southwestern
-  Northern
-  Eastern



○ District Office

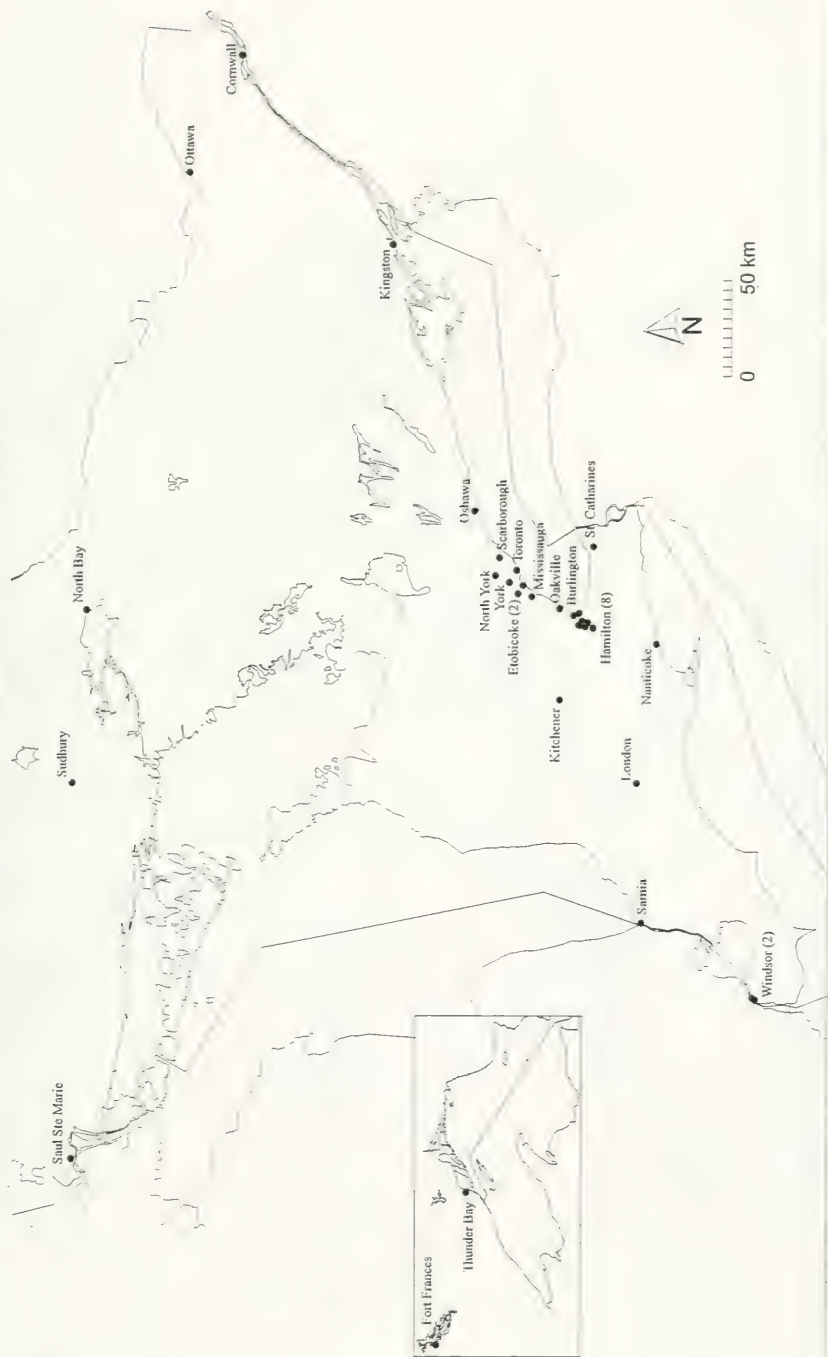
■ Regional Office

# MAP2 Location of Provincial Continuous SO<sub>2</sub> Air Monitoring Stations (1997)

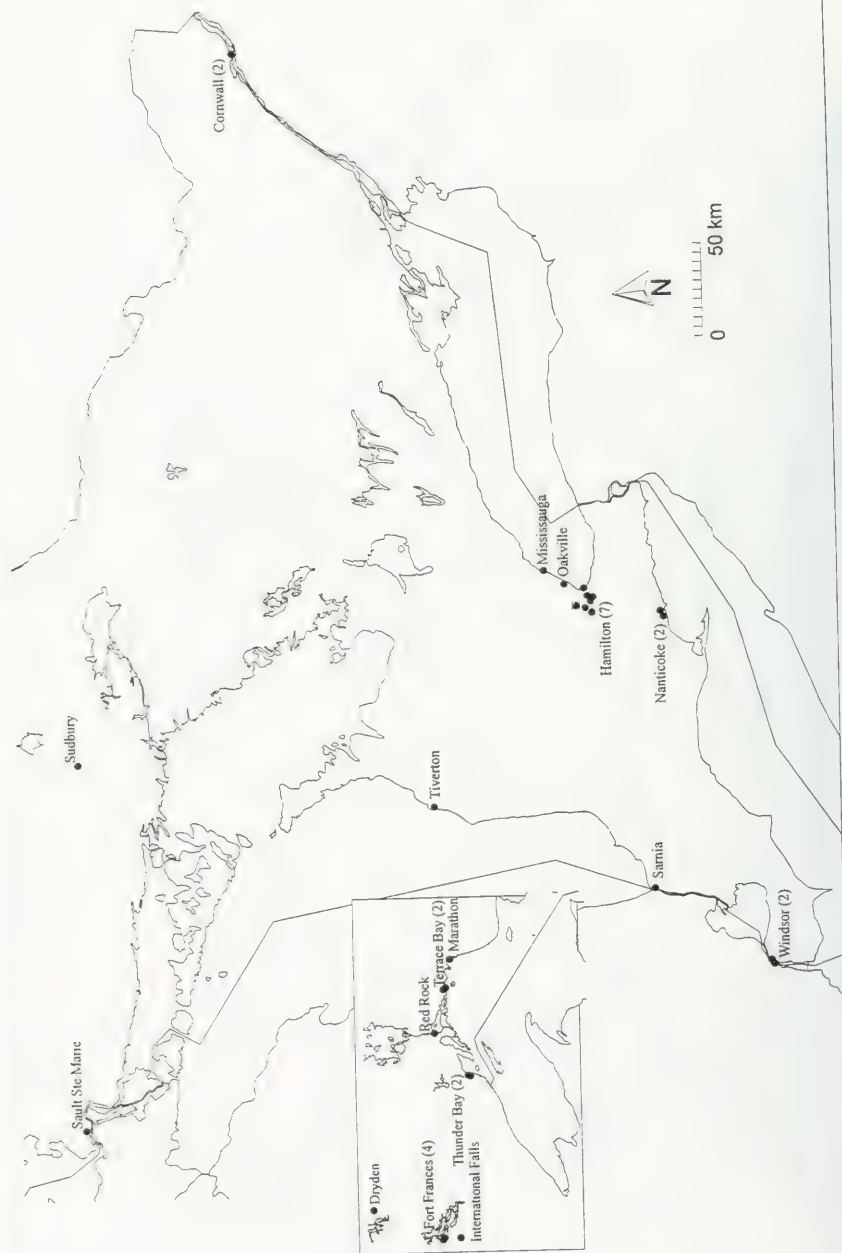




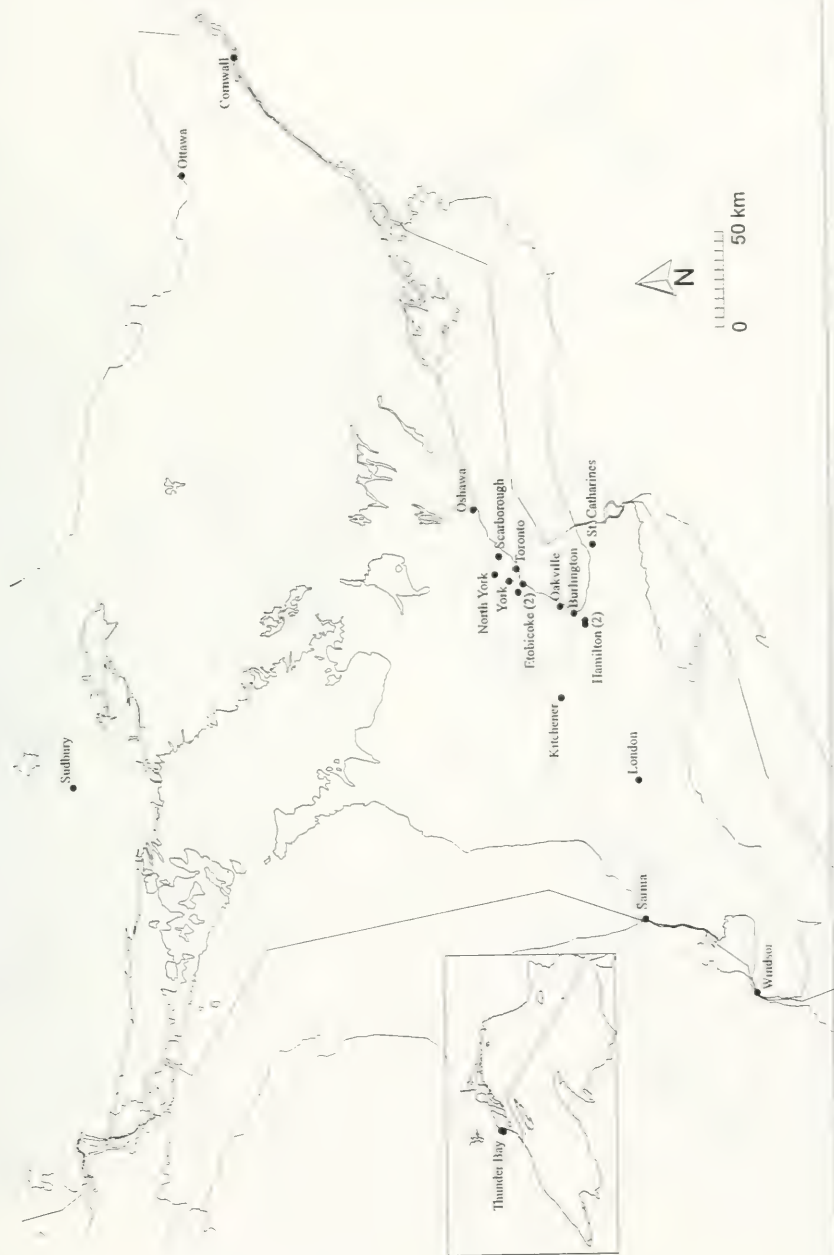
# **MAP 3 Location of Provincial Continuous SP (as COH) Air Monitoring Stations (1997)**



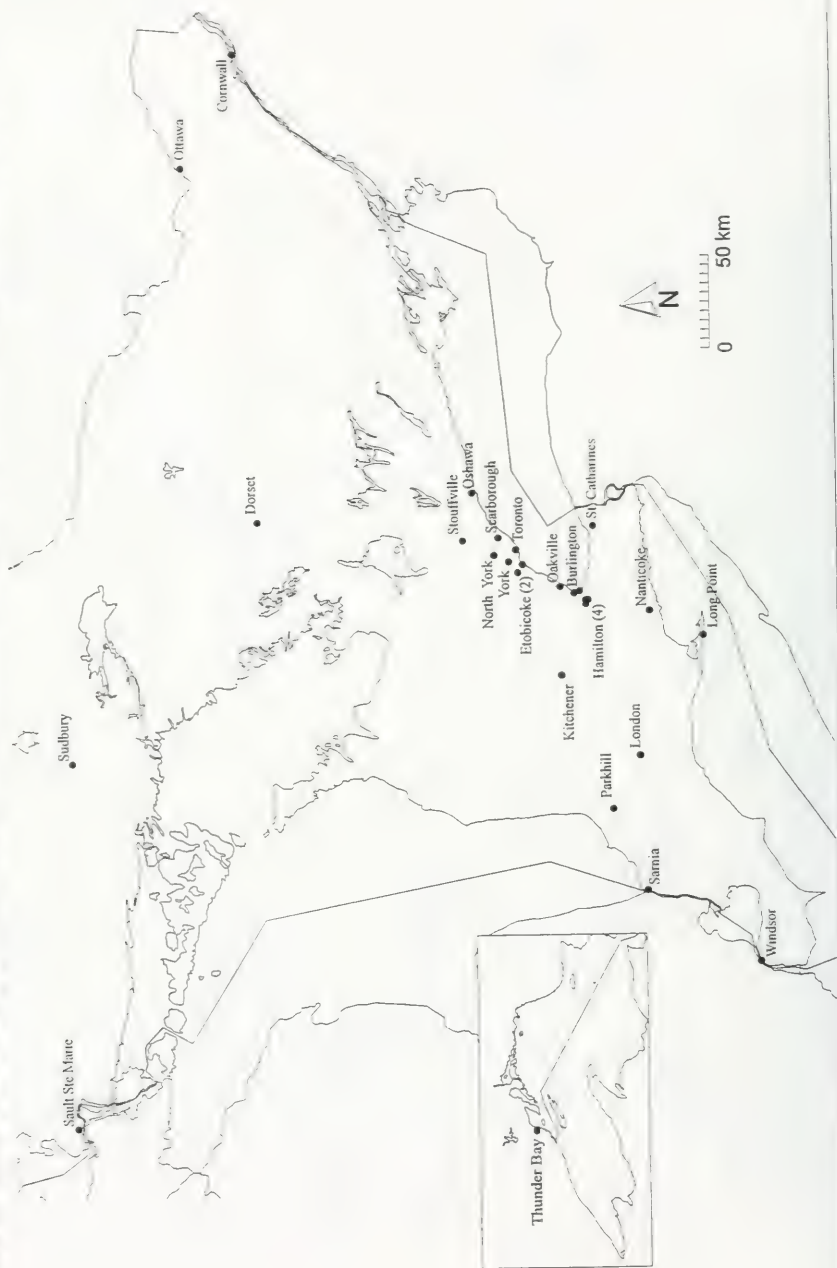
**MAP4 Location of Provincial Continuous TRS Air Monitoring Stations (1997)**



# MAP5 Location of Provincial Continuous CO Air Monitoring Stations (1997)

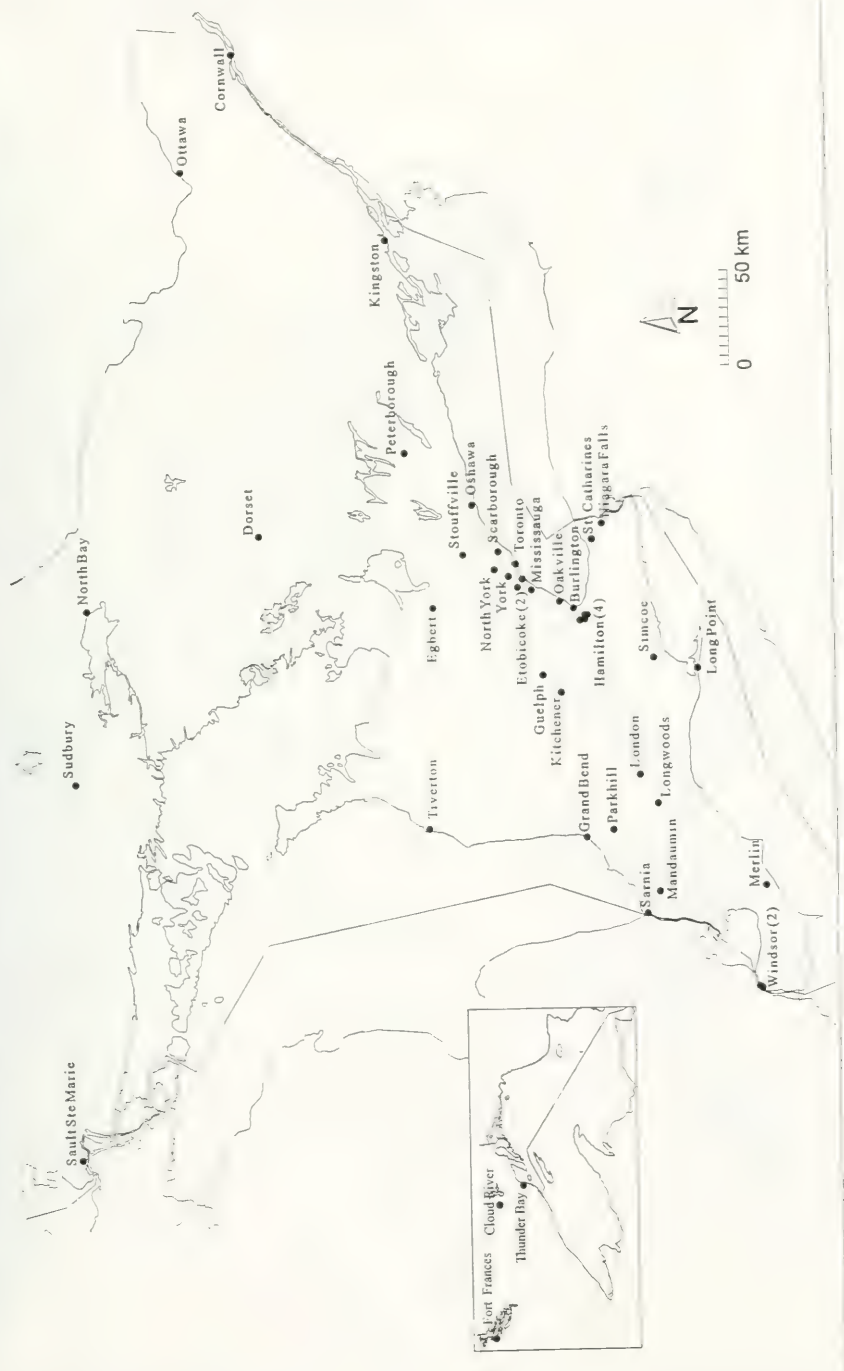


# MAP6 Location of Provincial Continuous NO<sub>2</sub> Air Monitoring Stations (1997)





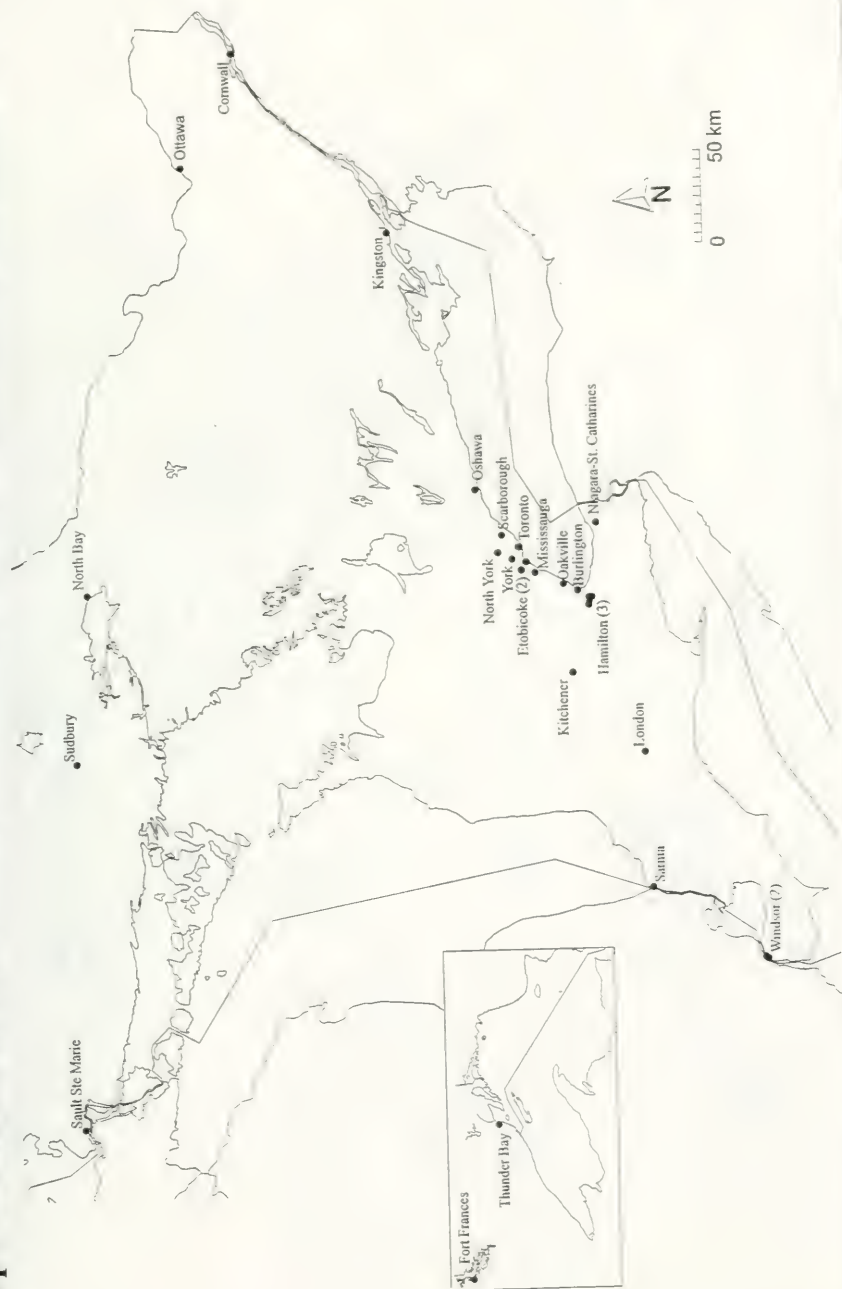
**MAP7 Location of Provincial Continuous O<sub>3</sub> Air Monitoring Stations (1997)**



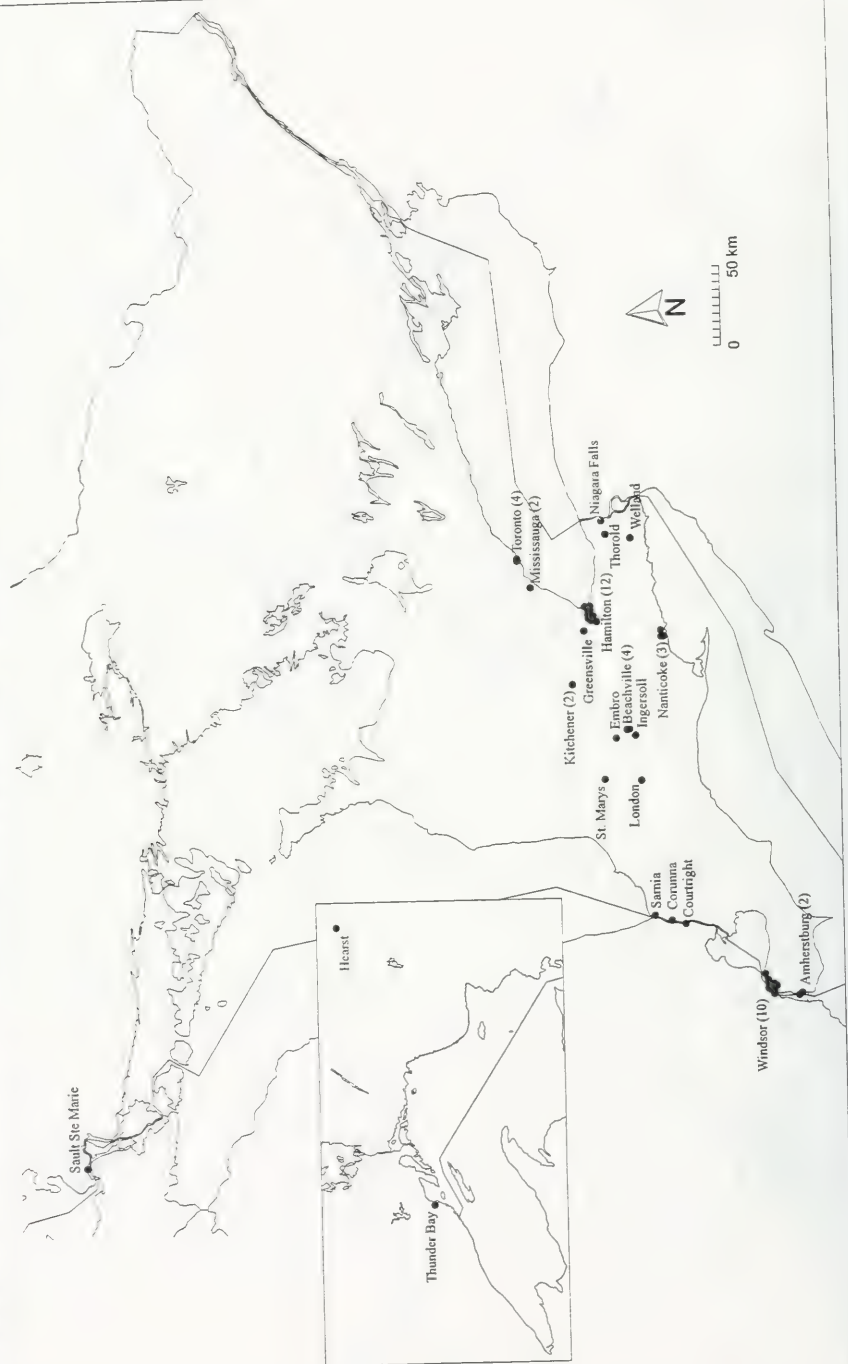
# MAP8 Location of Provincial Continuous PM<sub>10/2.5</sub> Air Monitoring Stations (1997)



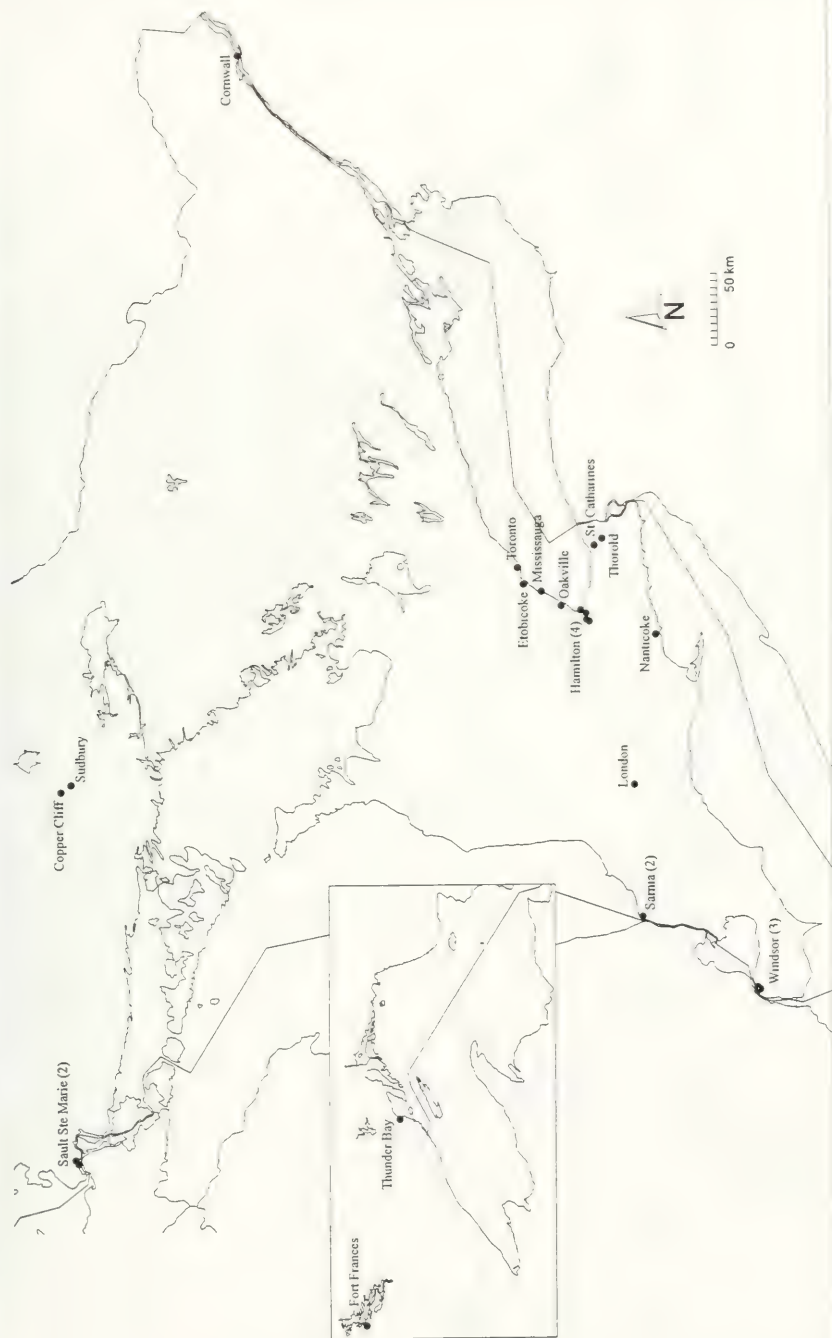
**Map9 Location of Provincial Continuous AQI Air Monitoring Stations (1997)**



**MAP10 Location of Provincial 24-Hour TSP Air Monitoring Stations (1997)**



MAP11 Location of Provincial 24-Hour PM<sub>10</sub> Air Monitoring Stations (1997)





**MAP12 Location of Provincial Continuous MET Air Monitoring Stations (1997)**

